

Telangana State Council Higher Education

Notations :

- Options shown in **green** color and with  icon are correct.
- Options shown in **red** color and with  icon are incorrect.

Question Paper Name :Geo Engineering and Geo Informatics 1st
Jun 2026 Shift 1**Subject Name :**

Geo Engineering and Geo Informatics

Creation Date :

2026-06-01 12:49:15

Duration :

120

Total Marks :

120

Display Marks:

Yes

Share Answer Key With Delivery Engine :

Yes

Actual Answer Key :

Yes

Change Font Color :

No

Change Background Color :

No

Change Theme :

No

Help Button :

No

Show Reports :

No

Show Progress Bar :

No

Geo Engineering and Geo Informatics

Group Number :

1

Group Id :

10513127

Group Maximum Duration :

0

Group Minimum Duration :

120

Show Attended Group? :

No

Edit Attended Group? :

No

Break time :

0

Group Marks :

120

Mathematics

Section Id :

10513165

Section Number :

1

Section type :	Online
Mandatory or Optional :	Mandatory
Number of Questions :	10
Number of Questions to be attempted :	10
Section Marks :	10
Maximum Instruction Time :	0
Sub-Section Number :	1
Sub-Section Id :	10513165
Question Shuffling Allowed :	Yes

Question Number : 1 Question Id : 1051313601 Question Type : MCQ Option Shuffling : Yes
 Display Question Number : Yes
 Correct Marks : 1 Wrong Marks : 0

The Eigenvalues of 3×3 real matrix A are 1, 2, 3 then $A^{-1} =$

Options :

1. ✖ $A^2 - 6A + 11I$

2. ✔ $\frac{1}{6}(A^2 - 6A + 11I)$

3. ✖ $\frac{1}{6}(A^3 - 6I)$

4. ✖ $A^3 - 6I$

Question Number : 2 Question Id : 1051313602 Question Type : MCQ Option Shuffling : Yes
 Display Question Number : Yes
 Correct Marks : 1 Wrong Marks : 0

Let $A = \begin{pmatrix} 1 & 1 & 0 \\ 0 & 1 & 1 \\ 0 & 0 & 1 \end{pmatrix}$. If u_1 and u_2 are column matrices such that $Au_1 = \begin{pmatrix} 2 \\ 1 \\ 0 \end{pmatrix}$ and $Au_2 = \begin{pmatrix} 1 \\ 0 \\ 1 \end{pmatrix}$

then $u_1 - u_2$ is

Options :

1. ✔

$$\begin{pmatrix} -1 \\ 2 \\ -1 \end{pmatrix}$$

2. ✖ $\begin{pmatrix} -1 \\ 1 \\ -1 \end{pmatrix}$

3. ✖ $\begin{pmatrix} 1 \\ -2 \\ -1 \end{pmatrix}$

4. ✖ $\begin{pmatrix} 2 \\ -1 \\ 1 \end{pmatrix}$

Question Number : 3 Question Id : 1051313603 Question Type : MCQ Option Shuffling : Yes
 Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Let a, b and c be real numbers. Suppose there exist real numbers x, y, z which are not all zero such that the system of equations $x = cy + bz$, $y = cx + az$ and $z = bx + ay$ has a non-zero solution then $(a+b+c)^2 =$

Options :

1. ✖ $a^2 + b^2 + c^2 + 2abc - 1$

2. ✖ $a^2 + b^2 + c^2 + 2ab + 2bc + 2ca - 1$

3. ✖ $1 + 2(ab + bc + ca + abc)$

4. ✔ $1 + 2(ab + bc + ca - abc)$

Question Number : 4 Question Id : 1051313604 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes**Correct Marks : 1 Wrong Marks : 0**

For the function $f(x) = \log x$, then the number c strictly between e^2 and e^3 that satisfies

$$f'(c) = \frac{f(e^3) - f(e^2)}{e^3 - e^2} \text{ is}$$

Options :

1. ✖ $\frac{1}{e^3 - e^2}$

2. ✖ $e^2 - e^3$

3. ✖ $\frac{1}{e^2 - e^3}$

4. ✔ $e^3 - e^2$

Question Number : 5 Question Id : 1051313605 Question Type : MCQ Option Shuffling : Yes**Display Question Number : Yes****Correct Marks : 1 Wrong Marks : 0**

The directional derivative of $f(x, y, z) = 4e^{2x-y+z}$ at the point $(1, 1, -1)$ in the direction of the vector $\hat{a} = -4\hat{i} + 4\hat{j} + 7\hat{k}$ is

Options :

1. ✖ $\frac{20}{9}$

2. ✖ $-\frac{48}{9}$

3. ✔ $-\frac{20}{9}$

4. ✖ $\frac{48}{9}$

Question Number : 6 Question Id : 1051313606 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

If $u = \sin^{-1} \left(\frac{x^{\frac{1}{3}} + y^{\frac{1}{3}}}{x^{\frac{1}{2}} - y^{\frac{1}{2}}} \right)^{\frac{1}{2}}$ then $x \frac{\partial u}{\partial x} + y \frac{\partial u}{\partial y} =$

Options :

1. ✓ $-\frac{1}{12} \tan u$

2. ✗ $\frac{1}{12} \tan u$

3. ✗ $\frac{1}{6} \cos u$

4. ✗ $-\frac{1}{6} \sin u$

Question Number : 7 Question Id : 1051313607 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

For which values of k does the function $f(z) = (x^3 - 3xy^2) + i(kx^2y - y^3)$ become analytic?

Options :

1. ✗ 0

2. ✗ 1

3. ✗ 2

4. ✓ 3

Question Number : 8 Question Id : 1051313608 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The value of the integral $\int_C \frac{ze^{-z}}{(z-1)(z-2)} dz$ where $C: |z| = \frac{3}{2}$ is

Options :

1. ✓ $-\frac{2\pi i}{e}$

2. ✗ $\frac{2\pi i}{e}$

3. ✗ $2\pi i e$

4. ✗ $-2\pi i e$

Question Number : 9 Question Id : 1051313609 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

If X and Y are independent random variables with variances $\sigma_x^2 = 5$ and $\sigma_y^2 = 3$ then the variance of the random variable $Z = 3X + 2Y - 5$ is

Options :

1. ✗ 35

2. ✗ 52

3. ✗ 75

4. ✓ 57

Question Number : 10 Question Id : 1051313610 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

If X is a Poisson random variable with variances $P(X=2) = 9P(X=4)$ then the mean and variance respectively are

Options :

1. ✓ $\frac{2}{\sqrt{3}}$ and $\frac{2}{\sqrt{3}}$

2. ✖ $\frac{1}{\sqrt{3}}$ and $\frac{2}{\sqrt{3}}$

3. ✖ 1 and 2

4. ✖ 2 and 2

Geo Engineering and Geo Informatics

Section Id :	10513166
Section Number :	2
Section type :	Online
Mandatory or Optional :	Mandatory
Number of Questions :	110
Number of Questions to be attempted :	110
Section Marks :	110
Maximum Instruction Time :	0
Sub-Section Number :	1
Sub-Section Id :	10513166
Question Shuffling Allowed :	Yes

Question Number : 11 Question Id : 1051313611 Question Type : MCQ Option Shuffling : Yes
Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

In which one of the following regions the chemical weathering process is more dominant than the mechanical process?

Options :

1. ✖ Glacier region
2. ✖ Arid region
3. ✖ Limestone region
4. ✔ Humid region

Question Number : 12 Question Id : 1051313612 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Given below are two statements

Statement-I: Medial moraines are imperfectly formed ones as compared to lateral moraines.

Statement-II: Medial moraines are indistinguishable from ground moraines.

The correct answer is

Options :

1. ✓ Only statement-I is correct
2. ✗ Only statement -II is correct
3. ✗ Both statement-I and statement-II are correct
4. ✗ Both statement-I and statement-II are incorrect

Question Number : 13 Question Id : 1051313613 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following landforms can be categorised under Fluvial landscape?

Options :

1. ✗ U-shaped valleys
2. ✓ V-shaped valleys
3. ✗ Pediments
4. ✗ Sand dunes

Question Number : 14 Question Id : 1051313614 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Tree like branching or veins of leaf pattern formed by streams is called

Options :

1. ✓ Dendritic pattern

2. ✖ Parallel pattern
3. ✖ Trellis pattern
4. ✖ Radial pattern

Question Number : 15 Question Id : 1051313615 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the listed authors stated “Landforms achieve equilibrium between resisting forces and driving forces”?

Options :

1. ✖ Davis (1840)
2. ✖ Penk (1845)
3. ✔ Gilbert (1918)
4. ✖ Horton (1945)

Question Number : 16 Question Id : 1051313616 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following refers to overturned fold?

Options :

1. ✔ A fold with an axial plane so inclined that one limb is upside down
2. ✖ A trough-like shape with the youngest rocks in the center
3. ✖ A bend with only one dipping limb
4. ✖ An arch-like shape with the oldest rocks in the centre

Question Number : 17 Question Id : 1051313617 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is not the characteristic of a syncline fold?

Options :

1. ✖ The limbs (sides) of the fold dip inward towards the central hinge or axis
2. ✖ Synclines are the result of compressional forces pushing rock layers downward
3. ✖ A downward-bending fold or downfold, that forms a U-shaped trough
4. ✔ The oldest rocks are pushed up to the core (center)

Question Number : 18 Question Id : 1051313618 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is the nature of Strike – Slip Fault?

Options :

1. ✖ A combination of vertical and horizontal movement
2. ✖ Hanging wall moves down due to tension
3. ✔ Rocks slide horizontally past each other
4. ✖ Hanging wall moves up due to compression

Question Number : 19 Question Id : 1051313619 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

A reverse fault is caused by

Options :

1. ✔ Compressional stress
2. ✖ Shear stress

3. ✖ Extensional stress

4. ✖ Complex stress

Question Number : 20 Question Id : 1051313620 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

An unconformity that occurs when younger sedimentary rocks are deposited on an eroded and tilted surface of older sedimentary rocks is called as

Options :

1. ✖ Nonconformity

2. ✔ Angular unconformity

3. ✖ Disconformity

4. ✖ Blended unconformity

Question Number : 21 Question Id : 1051313621 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The cleavage which occurs in rocks with minerals that are not evenly distributed is called as

Options :

1. ✖ Transposition cleavage

2. ✖ Slaty cleavage

3. ✖ Continuous cleavage

4. ✔ Spaced cleavage

Question Number : 22 Question Id : 1051313622 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The response of mineral assemblages to decreasing temperature and pressure is observed in

Options :

1. ✓ Retrograde metamorphism
2. ✗ Metasomatic metamorphism
3. ✗ Hydrothermal metamorphism
4. ✗ Poly metamorphism

Question Number : 23 Question Id : 1051313623 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Given below are two statements:

Statement-I: Tectonic fabrics reveal the direction and magnitude of past stresses, allowing reconstruction of tectonic events.

Statement-II: Tectonites provide insights into the processes of mountain building, continental collision.

The correct answer is

Options :

1. ✗ Only statement-I is correct
2. ✗ Only statement-II is correct
3. ✓ Both statement-I and statement-II are correct
4. ✗ Both statement-I and statement-II are incorrect

Question Number : 24 Question Id : 1051313624 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The surface along which the lattice points are shared in twinned crystals is called as

Options :

1. ✓ Composition surface

- 2. ✖ Triaxial surface
- 3. ✖ Twisted surface
- 4. ✖ Jointed surface

Question Number : 25 Question Id : 1051313625 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is not the Twins law?

Options :

An axis of even fold symmetry can never become a twin axis, only 3-fold symmetry axis can

- 1. ✖ serve as a twin axis

Twins that develop in classes with a centre of symmetry have both twin axis and twinning

- 2. ✖ plane perpendicular to it

- 3. ✔ Twinning plane can coincide with symmetry planes

- 4. ✖ Twin axis is always normal to the twin plane but need not be normal to composition plane

Question Number : 26 Question Id : 1051313626 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The degree of symmetry that the isometric crystal system possesses is

Options :

- 1. ✔ 23

- 2. ✖ 13

- 3. ✖ 1

- 4. ✖ 9

Question Number : 27 Question Id : 1051313627 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Given below are two statements

Statement-I: The octahedron form is composed of 8 equilateral triangles.

Statement-II: In the octahedron, the triangle-shape faces will not intersect all three crystallographic axes at the same distance.

The correct answer is

Options :

1. ✖ Only statement-I is correct
2. ✖ Only statement-II is correct
3. ✔ Both statement-I and statement-II are correct
4. ✖ Both statement-I and statement-II are incorrect

Question Number : 28 Question Id : 1051313628 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The approximate percentage of Silicon available in the earth's crust is

Options :

1. ✖ 47
2. ✔ 27
3. ✖ 8
4. ✖ 5

Question Number : 29 Question Id : 1051313629 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

In which of the following minerals, the combination of metallic alloys "Copper + Zinc + Aluminium" is reflected?

Options :

1. ✖ Kamacite alpha
2. ✖ Belendorffite
3. ✖ Danbaite
4. ✔ Cupalite

Question Number : 30 Question Id : 1051313630 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following minerals does not come under the category of Halite group?

Options :

1. ✔ Cryolite
2. ✖ Sylvite
3. ✖ Sal Ammoniac
4. ✖ Villiaumite

Question Number : 31 Question Id : 1051313631 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following rocks possesses highest compressive strength?

Options :

1. ✖ Limestone
2. ✔ Basalt
3. ✖ Granite
4. ✖ Sandstone

Question Number : 32 Question Id : 1051313632 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Clay minerals are found commonly in

Options :

1. ✖ Micaceous stones
2. ✖ Siliceous stones
3. ✖ Calcareous stones
4. ✔ Argillaceous stones

Question Number : 33 Question Id : 1051313633 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is not the quality of a preservative used for stone preservation?

Options :

1. ✖ Easily penetrating
2. ✔ Leachable
3. ✖ Economical
4. ✖ Easily applicable

Question Number : 34 Question Id : 1051313634 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The shear strength of common building stones in terms of their compressive strength typically varies from

Options :

1. ✖ 10 to 20
2. ✖ $\frac{1}{5}$ to $\frac{1}{10}$

3. ✓ $\frac{1}{10}^{\text{th}}$ to $\frac{1}{20}^{\text{th}}$

4. ✗ 5 to 10

Question Number : 35 Question Id : 1051313635 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is not preferred with respect to the Dam construction site is concerned?

Options :

1. ✓ Strata dipping downstream
2. ✗ Presence of Igneous rock
3. ✗ Presence of low permeable foundation strata
4. ✗ Strata dipping upstream

Question Number : 36 Question Id : 1051313636 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is formed due to the dissolution of soluble rock?

Options :

1. ✗ Coastal landscapes
2. ✓ Sinkholes
3. ✗ Landslides
4. ✗ Ash deposition

Question Number : 37 Question Id : 1051313637 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The ground condition where the tunnel roof typically needs immediate support after excavation and walls can only stand for a few minutes is called as

Options :

1. ✖ Firm ground
2. ✖ Running ground
3. ✔ Soft ground
4. ✖ Self-supporting ground

Question Number : 38 Question Id : 1051313638 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

If the D_{10} is the effective grain size, the coefficient of permeability of a soil is proportional to

Options :

1. ✖ D_{10}
2. ✔ $(D_{10})^2$
3. ✖ $(D_{10})^3$
4. ✖ $(D_{10})^{\frac{1}{2}}$

Question Number : 39 Question Id : 1051313639 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The specific yield of a fine-grained material such as clay and shale is

Options :

1. ✔ Less than or equal to 5%
2. ✖ 6 to 10%

3. ✖ 11 to 15%

4. ✖ 16 to 25%

Question Number : 40 Question Id : 1051313640 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

In a porous media, the velocity of the percolating fluid is directly proportional to the hydraulic gradient. This statement was proposed by

Options :

1. ✔ Henry Darcy

2. ✖ Coulomb

3. ✖ Stoke

4. ✖ Allen Hazen

Question Number : 41 Question Id : 1051313641 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Given below are two statements

Statement-I: The movement of the earth on its axis is called as Revolution.

Statement-II: The movement of the earth around the sun in a fixed path or orbit is called Rotation.

The correct answer is

Options :

1. ✖ Only statement-I is correct

2. ✖ Only statement-II is correct

3. ✖ Both statement-I and statement-II are correct

4. ✔ Both statement-I and statement-II are incorrect

Question Number : 42 Question Id : 1051313642 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

On which days, the direct rays of sun, fall on the equator?

Options :

1. ✖ 19th March and 19th September
2. ✖ 21st February and 23rd August
3. ✔ 21st March and 23rd September
4. ✖ 19th February and 19th August

Question Number : 43 Question Id : 1051313643 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Every object in the universe attracts every other object with a force which is proportional to the product of their masses and inversely proportional to the

Options :

1. ✔ Square of the distance between them
2. ✖ Square root of the distance between them
3. ✖ Distance between them
4. ✖ Cube root of the distance between them

Question Number : 44 Question Id : 1051313644 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following laws is most applicable to describe the motion of the satellites of the earth?

Options :

1. ✖ Newton's laws

2. ✓ Kepler's laws
3. ✗ Einstein's theory of relativity
4. ✗ Kirchhoff's laws

Question Number : 45 Question Id : 1051313645 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The mean distance between the sun and the earth in terms of light years is

Options :

1. ✗ 48.311 minutes
2. ✗ 28.311 minutes
3. ✗ 18.311 minutes
4. ✓ 8.311 minutes

Question Number : 46 Question Id : 1051313646 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Given below are two statements

Statement-I: The stars are localised lumps of gas within a nebula.

Statement-II: The gravitational force within the lumps leads to the formation of a core to the gas cloud.

The correct answer is

Options :

1. ✗ Only statement-I is correct
2. ✗ Only statement-II is correct
3. ✓ Both statement-I and statement-II are correct
4. ✗ Both statement-I and statement-II are incorrect

Question Number : 47 Question Id : 1051313647 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

“The net magnetic flux through any closed surface is zero” was stated by

Options :

1. ✓ Coulomb
2. ✗ Gauss
3. ✗ Faraday
4. ✗ Kirchhoff

Question Number : 48 Question Id : 1051313648 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The earth behaves as a magnet with the magnetic field pointing approximately from the

Options :

1. ✓ Geographic south to the north
2. ✗ Geographic north to the south
3. ✗ Geographic east to the north
4. ✗ Geographic west to the north

Question Number : 49 Question Id : 1051313649 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The geothermal gradient is expressed in

Options :

1. ✗ Degree Celsius/km²

- 2. ✓ Degree Celsius/km
- 3. ✗ km²/Degree Celsius
- 4. ✗ km/Degree Celsius

Question Number : 50 Question Id : 1051313650 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The Singareni Collieries Company Limited (SCCL) has set up a 20 kW pilot geothermal power plant in Telangana at

Options :

- 1. ✗ Ramagundam
- 2. ✗ Satthupally
- 3. ✗ Bellampally
- 4. ✓ Manuguru

Question Number : 51 Question Id : 1051313651 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The thickness of the continental crust in the Himalayan region is

Options :

- 1. ✗ 5 km
- 2. ✗ 15 km
- 3. ✗ 30 km
- 4. ✓ 70 km

Question Number : 52 Question Id : 1051313652 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The waves responsible for elongating and squeezing of the material while propagating are

Options :

1. ✖ S – waves
2. ✖ L – waves
3. ✖ R – waves
4. ✔ P – waves

Question Number : 53 Question Id : 1051313653 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

At what depth from the earth's surface, the Gutenberg Discontinuity is positioned in the interior of the earth?

Options :

1. ✖ 3900 km
2. ✔ 2900 km
3. ✖ 1900 km
4. ✖ 900 km

Question Number : 54 Question Id : 1051313654 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The reason for decreasing of seismic wave energy with the distance is

Options :

1. ✖ Scattering
2. ✖ Absorption
3. ✔ Scattering and Absorption

4. ✖ Entrapped air

Question Number : 55 Question Id : 1051313655 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The seismic zone factor for Hyderabad city is

Options :

1. ✖ 0.36

2. ✖ 0.24

3. ✖ 0.16

4. ✔ 0.10

Question Number : 56 Question Id : 1051313656 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Over the deep water of ocean, Tsunami has

Options :

1. ✔ Very long wavelength and limited wave height

2. ✖ Small wavelength and high wave height

3. ✖ Very long wavelength and high wave height

4. ✖ Small wavelength and limited wave height

Question Number : 57 Question Id : 1051313657 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Given below are two statements

Statement-I: The energy to the tropical cyclone comes from the latent heat released by the cold air.

Statement-II: With the increase in distance from the sea, the force of the cyclone decreases.

The correct answer is

Options :

1. ✖ Only statement-I is correct
2. ✔ Only statement-II is correct
3. ✖ Both statement-I and statement-II are correct
4. ✖ Both statement-I and statement-II are incorrect

Question Number : 58 Question Id : 1051313658 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Deforestation comes under which one of the following hazards?

Options :

1. ✖ Geological hazards
2. ✖ Biological hazards
3. ✖ Water & Climatic hazards
4. ✔ Environmental hazards

Question Number : 59 Question Id : 1051313659 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

A disaster is a result from the

Options :

1. ✔ Combination of hazard, vulnerability and insufficient capacity

2. ✖ Combination of hazard and vulnerability
3. ✖ Combination of hazard and insufficient capacity
4. ✖ Hazard alone

Question Number : 60 Question Id : 1051313660 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is incorrect?

Options :

1. ✖ The level of risk will depend on the nature of the hazard
2. ✖ The level of risk will depend on the vulnerability
3. ✖ The level of risk will depend on the economic value
4. ✔ The level of risk will depend on the human activities

Question Number : 61 Question Id : 1051313661 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The most common shape for continents is

Options :

1. ✔ Triangle
2. ✖ Square
3. ✖ Trapezium
4. ✖ Circular arch

Question Number : 62 Question Id : 1051313662 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The continental drift theory of studying the distribution of the oceans and the continents was put forth by

Options :

1. ✖ Antonio Pellegrini
2. ✖ Abraham Ortelius
3. ✔ Alfred Wegener
4. ✖ Sorensen

Question Number : 63 Question Id : 1051313663 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The concept of the ocean floor or seafloor spreading was proposed by

Options :

1. ✖ Alfred Wegener
2. ✖ Antonio Pellegrini
3. ✖ Brown Kennet
4. ✔ Harry Hess

Question Number : 64 Question Id : 1051313664 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The small objects in the Solar System which are rocky and irregular in shape are called as

Options :

1. ✖ Comets
2. ✔ Asteroids
3. ✖ Aliens

4. ✖ Stars

Question Number : 65 Question Id : 1051313665 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The average depth of the world's oceans is approximately

Options :

1. ✖ 3.655 km

2. ✖ 3.566 km

3. ✖ 3.866 km

4. ✔ 3.688 km

Question Number : 66 Question Id : 1051313666 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The deep valleys cutting across the continental shelf and slope are known as

Options :

1. ✔ Submarine Canyons

2. ✖ Seamounts and Guyots

3. ✖ Atolls and Reefs

4. ✖ Mid-Oceanic Ridges

Question Number : 67 Question Id : 1051313667 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The volcanic origin deposits which are formed on the ocean floor at a depth of 3 km to 6 km in the Abyssal Plain region are known as

Options :

1. ✖ Calcareous ooze
2. ✖ Pelagiatic deposits
3. ✖ Radiolarian ooze
4. ✔ Red clay

Question Number : 68 Question Id : 1051313668 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which mineral group is abundantly found in the earth's crust?

Options :

1. ✖ Mica group
2. ✖ Felspar group
3. ✔ Oxide group
4. ✖ Olivine group

Question Number : 69 Question Id : 1051313669 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The mineral used for smelting of iron ore is

Options :

1. ✖ Bauxite
2. ✔ Manganese
3. ✖ Copper
4. ✖ Mica

Question Number : 70 Question Id : 1051313670 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The tendency of a crystallized mineral to break along certain directions yielding more or less smooth, plane surfaces is

Options :

1. ✓ Tenacity
2. ✗ Hardness
3. ✗ Cleavage
4. ✗ Fracture

Question Number : 71 Question Id : 1051313671 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The surveying method used to carry out the scientific studies such as determination of the Earth's magnetic field and direction of continental drifts is

Options :

1. ✗ Cadastral surveying
2. ✗ Aerial surveying
3. ✓ Geodetic surveying
4. ✗ Topographical surveying

Question Number : 72 Question Id : 1051313672 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is not the reason for development of cumulative/ or systematic errors in the surveying process?

Options :

1. ✓ Displacement of arrows or station marks

2. ✖ Expansion of steel tape
3. ✖ Effect of tension on the tape
4. ✖ Badly adjusted instrument

Question Number : 73 Question Id : 1051313673 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

A metric chain of nominal length 20 m is found to be 20.2 m long and using it an area of 100 hectares is computed. The true area is

Options :

1. ✖ 98.02 hectares
2. ✔ 102.01 hectares
3. ✖ 100.00 hectares
4. ✖ 101.01 hectares

Question Number : 74 Question Id : 1051313674 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

A distance of 1000 m was measured in the field at a mean temperature of 60°F using a tape of coefficient of thermal expansion $5 \times 10^{-6} / ^\circ\text{F}$. If the standardization temperature is 80°F, the correction value for temperature is

Options :

1. ✔ - 0.1 m
2. ✖ 0.1 m
3. ✖ - 0.12 m
4. ✖ + 0.12 m

Question Number : 75 Question Id : 1051313675 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following instrument is generally used to measure the slope angle of the ground?

Options :

1. ✖ Optical square
2. ✖ Cross staff
3. ✔ Abney level
4. ✖ Cross meter

Question Number : 76 Question Id : 1051313676 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

If L = measured length on the slope, θ = angle of the slope and h = difference in elevation of the ends of the tape, the required approximate and exact slope corrections respectively are

Options :

1. ✔ $\frac{h^2}{(2L)}$ and $(1 - \cos \theta)L$
2. ✖ $\frac{h^2}{L}$ and $(1 + \cos \theta)L$
3. ✖ $\frac{h^3}{(2L^2)}$ and $(1 - \cos \theta)L$
4. ✖ $\frac{h^3}{L^2}$ and $(1 + \cos \theta)L$

Question Number : 77 Question Id : 1051313677 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Given below are two statements

Statement-I: The vertical height of a point above or below a reference datum is referred to as the reduced level.

Statement-II: Reduced levels cannot be used to produce the ground contours on a plan.

The correct answer is

Options :

1. ✓ Only statement-I is correct
2. ✗ Only statement-II is correct
3. ✗ Both statement-I and statement-II are correct
4. ✗ Both statement-I and statement-II are incorrect

Question Number : 78 Question Id : 1051313678 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The Mean Sea Level (MSL) is the average height for the surface of the seas for all stages of tide over a period of

Options :

1. ✗ 18 years
2. ✓ 19 years
3. ✗ 20 years
4. ✗ 21 years

Question Number : 79 Question Id : 1051313679 Question Type : MCQ Option Shuffling : Yes

Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

If D is the horizontal distance in kilometers, then the combined correction 'C' (in meters) for the Earth's curvature and atmospheric refraction is

Options :

1. ✖ $C = -0.0785 D^2$
2. ✖ $C = +0.0785 D^2$
3. ✖ $C = +0.0673 D^2$
4. ✔ $C = -0.0673 D^2$

Question Number : 80 Question Id : 1051313680 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Oblique extinction is shown by most prismatic sections of minerals crystallizing in the following crystal system.

Options :

1. ✖ Cubic
2. ✖ Orthorhombic
3. ✔ Monoclinic
4. ✖ Triclinic

Question Number : 81 Question Id : 1051313681 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The software in which the data surveyed by total station cannot be used directly is

Options :

1. ✔ Autodesk Revit
2. ✖ Surfer
3. ✖ Auto CAD
4. ✖ Arc GIS

Question Number : 82 Question Id : 1051313682 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

If the intercept on a vertical staff is observed as 0.3 m from a tacheometer, then the horizontal distance between tacheometer and the staff station is

Options :

1. ✖ 3.0 m
2. ✔ 30 m
3. ✖ 1.5 m
4. ✖ 15 m

Question Number : 83 Question Id : 1051313683 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The flying height of a flight and average ground elevations respectively from MSL are 3.45 km and 450 m. If the focal length of the camera used is 150 mm, then the scale of the aerial photograph is

Options :

1. ✖ 1:30000
2. ✖ 1:25000
3. ✔ 1:20000
4. ✖ 1:15000

Question Number : 84 Question Id : 1051313684 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is not an objective of the triangulation survey?

Options :

1. ✖ Establishing accurate control for photogrammetric surveys of large areas
2. ✖ Determination of accurate locations of points in engineering works
3. ✔ Determination of earth's curvature correction
4. ✖ Detection of crustal movements

Question Number : 85 Question Id : 1051313685 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

“A curve is composed of two arcs of equal or different radius bending or curving in opposite direction with common tangent at their junction and their centres being in opposite sides of the curve” is known as

Options :

1. ✖ Compound curve
2. ✔ Reverse curve
3. ✖ Transition curve
4. ✖ Combined curve

Question Number : 86 Question Id : 1051313686 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Identify the software programme, which is commonly used to acquire the data directly from the total station, after the surveying process is completed

Options :

1. ✖ STADD Pro
2. ✔ Surfer
3. ✖ Primavera

4. ✖ Autodesk Revit**Question Number : 87 Question Id : 1051313687 Question Type : MCQ Option Shuffling : Yes****Display Question Number : Yes****Correct Marks : 1 Wrong Marks : 0**

The aerial photograph made with the optical axis coinciding with the direction of gravity is

Options :

1. ✖ Tilted photograph
2. ✔ Vertical photograph
3. ✖ Terrestrial photograph
4. ✖ Oblique photograph

Question Number : 88 Question Id : 1051313688 Question Type : MCQ Option Shuffling : Yes**Display Question Number : Yes****Correct Marks : 1 Wrong Marks : 0**

A camera of 0.20 m focal length was used to take the vertical photograph of a terrain, whose average elevation is 1000 m. In order to get the scale of 1:5000, at what height above the sea level the aircraft must fly?

Options :

1. ✔ 2000 m
2. ✖ 1000 m
3. ✖ 200 m
4. ✖ 5000 m

Question Number : 89 Question Id : 1051313689 Question Type : MCQ Option Shuffling : Yes**Display Question Number : Yes****Correct Marks : 1 Wrong Marks : 0**

The point, where the perpendicular, projected through the centre of the lens intersects the photo image is known as

Options :

1. ✖ Plumb point
2. ✖ Isocentre
3. ✖ Nadir
4. ✔ Principal point

Question Number : 90 Question Id : 1051313690 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is the minimum inclination angle that is to be provided in a tilted photograph?

Options :

1. ✖ 13°
2. ✔ 3°
3. ✖ 33°
4. ✖ 33.33°

Question Number : 91 Question Id : 1051313691 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The region that cannot be used in the Remote Sensing application is

Options :

1. ✖ Visible region
2. ✔ Radio waves region
3. ✖ Infrared region
4. ✖ Microwave region

Question Number : 92 Question Id : 1051313692 Question Type : MCQ Option Shuffling : Yes
Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Given below are two statements

Statement-I: Geostationary satellite orbits the Earth at an altitude of 700- 900 km.

Statement-II: Geostationary satellites are used to monitor the weather and telecommunication.

The correct answer is

Options :

1. ✖ Only statement-I is correct
2. ✔ Only statement-II is correct
3. ✖ Both statement-I and statement-II are correct
4. ✖ Both statement-I and statement-II are incorrect

Question Number : 93 Question Id : 1051313693 Question Type : MCQ Option Shuffling : Yes
Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The sensor used in the satellite remote sensing is

Options :

1. ✖ Photographic sensor
2. ✔ Non-photographic sensor
3. ✖ UV sensor
4. ✖ Infrared sensor

Question Number : 94 Question Id : 1051313694 Question Type : MCQ Option Shuffling : Yes
Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

IRS LISS - III Satellite sensor resolution and number of bands respectively are

Options :

1. ✖ 23.00 m × 23.00 m and 1
2. ✖ 5.80 m × 5.80 m and 4
3. ✔ 23.00 m × 23.00 m and 4
4. ✖ 5.80 m × 5.80 m and 1

Question Number : 95 Question Id : 1051313695 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Given below are two statements

Statement-I: The variations in the tone depend upon the orientation of incoming radiations and surface properties.

Statement-II: The smooth and dry object surfaces reflect less energy in comparison to the rough and moist surfaces.

The correct answer is

Options :

1. ✔ Only statement-I is correct
2. ✖ Only statement-II is correct
3. ✖ Both statement-I and statement-II are correct
4. ✖ Both statement-I and statement-II are incorrect

Question Number : 96 Question Id : 1051313696 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is the Rock Outcrops colour signatures on standard False colour composite?

Options :

1. ✖ Bright red
2. ✔ Light brown

3. ✖ Light blue to white

4. ✖ Motelled black

Question Number : 97 Question Id : 1051313697 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Process of conversion of pixel image into point, line and polygon format is called as

Options :

1. ✖ Rasterization

2. ✖ Vectorization

3. ✔ Image processing

4. ✖ Clipping

Question Number : 98 Question Id : 1051313698 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

In Geographical Information Systems, the term “layer” refers to

Options :

1. ✖ A physical layer of material in hardware

2. ✖ An interface component for user interaction

3. ✔ A collection of related data or information over a particular area

4. ✖ A filter used for data visualization

Question Number : 99 Question Id : 1051313699 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is not a common type of remote sensing sensor?

Options :

1. ✖ Hyperspectral
2. ✖ LiDAR
3. ✖ Radar
4. ✔ Microphone

Question Number : 100 Question Id : 1051313700 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The data capture subsystem of a Geographical Information System primarily performs the function of

Options :

1. ✖ Transformation of Data
2. ✔ Acquiring Data
3. ✖ Storage of Data Elements
4. ✖ Retrieval of Data Elements

Question Number : 101 Question Id : 1051313701 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The energy received by the Earth from the Sun is called as

Options :

1. ✔ Electromagnetic radiation
2. ✖ Gamma radiation
3. ✖ X - ray radiation
4. ✖ UV radiation

Question Number : 102 Question Id : 1051313702 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which of the following common natural surfaces on the Earth have highest albedo?

Options :

1. ✖ Dry soil
2. ✖ Clear water
3. ✖ Needle leaf vegetation
4. ✔ Snow and Ice

Question Number : 103 Question Id : 1051313703 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

How many times, the electromagnetic energy passes through the atmosphere from the Sun to the Earth and back to the sensor?

Options :

1. ✖ Three
2. ✔ Two
3. ✖ One
4. ✖ Four

Question Number : 104 Question Id : 1051313704 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The revisit time of a Moderate Resolution Imaging Spectroradiometer (MODIS) satellite sensor is

Options :

1. ✖ 6 days

- 2. ✖ 16 days
- 3. ✖ 4 days
- 4. ✔ 2 days

Question Number : 105 Question Id : 1051313705 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The temporal resolution of a larger swath width covered by the satellite is

Options :

- 1. ✖ Low
- 2. ✖ Moderate
- 3. ✔ Higher
- 4. ✖ Zero

Question Number : 106 Question Id : 1051313706 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is incorrect with reference to the Raster Data?

Options :

- 1. ✔ Discrete Data
- 2. ✖ Continuous data
- 3. ✖ Made up of PIXELS
- 4. ✖ Larger file size

Question Number : 107 Question Id : 1051313707 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Arrange the GIS Data Modelling Steps (A, B, C and D) in the correct order

- A. Identify possible features from the real world
- B. Use the selected method to represent the feature in the GIS
- C. Select a method for representing the feature in the GIS
- D. Identify appropriate attributes for the feature

Options :

- 1. ✖ A, B, D, C
- 2. ✖ B, C, D, A
- 3. ✖ B, A, C, D
- 4. ✔ A, C, B, D

Question Number : 108 Question Id : 1051313708 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following is not a commercial GIS software?

Options :

- 1. ✖ MapInfo
- 2. ✔ Quantum GIS
- 3. ✖ esri
- 4. ✖ GIS Cloud

Question Number : 109 Question Id : 1051313709 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The GNSS service developed indigenously by the ISRO is

Options :

- 1. ✖ EGNOS
- 2. ✖ MSAS

3. ✓ IRNSS

4. ✗ CWAAS

Question Number : 110 Question Id : 1051313710 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The height derived or deduced directly from the GPS observations is referred as

Options :

1. ✗ The sensitive height

2. ✗ The plyometric height

3. ✗ The variable height

4. ✓ The ellipsoidal height

Question Number : 111 Question Id : 1051313711 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Which one of the following indicates an approximate range of runoff coefficient for a clay soil?

Options :

1. ✗ 0.05 to 0.20

2. ✓ 0.55 to 0.82

3. ✗ 0.46 to 0.50

4. ✗ 0.82 to 0.90

Question Number : 112 Question Id : 1051313712 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The Physiographical factors that affect the runoff is

Options :

1. ✓ Size of watershed
2. ✗ Duration of rainfall
3. ✗ Rainfall intensity
4. ✗ Type of precipitation

Question Number : 113 Question Id : 1051313713 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Evapotranspiration is typically expressed in which one of the following units?

Options :

1. ✗ mm^3
2. ✓ mm
3. ✗ kg mass per second
4. ✗ mm^2

Question Number : 114 Question Id : 1051313714 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

In the earth's atmosphere, the lowest layer where all weather occurs is called

Options :

1. ✗ Thermosphere
2. ✗ Stratosphere
3. ✗ Mesosphere
4. ✓ Troposphere

Question Number : 115 Question Id : 1051313715 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The saline concentration of inland waters is

Options :

1. ✖ 10 to 20%
2. ✖ 20 to 30%
3. ✔ Less than 5%
4. ✖ Greater than 100%

Question Number : 116 Question Id : 1051313716 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

Biotic community that breaks down the complex organic compounds into dead matter is

Options :

1. ✖ Aerophyte
2. ✔ Saprotrophs
3. ✖ Heterotrophs
4. ✖ Autotrophs

Question Number : 117 Question Id : 1051313717 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The term 'extinction' is mostly related to the following environmental issue

Options :

1. ✖ Air pollution
2. ✖ Climate change

- 3. ✖ Waste production
- 4. ✔ Biodiversity depletion

Question Number : 118 Question Id : 1051313718 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

In a total volume of 1 m^3 of soil, if the pores volume is 0.5 m^3 , then the porosity of soil grains is

Options :

- 1. ✖ 30.33 %
- 2. ✖ 33.33 %
- 3. ✔ 50 %
- 4. ✖ 50.33 %

Question Number : 119 Question Id : 1051313719 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

A pure cohesive soil has cohesion value of 40 kPa, then as per the Mohr's – Coulomb equation its shear strength is

Options :

- 1. ✖ 10 kPa
- 2. ✖ 20 kPa
- 3. ✖ 30 kPa
- 4. ✔ 40 kPa

Question Number : 120 Question Id : 1051313720 Question Type : MCQ Option Shuffling : Yes Display Question Number : Yes

Correct Marks : 1 Wrong Marks : 0

The unit for the coefficient of permeability of a soil is

Options :

1. ✓ cm/s
2. ✗ cm s
3. ✗ cm/s²
4. ✗ cm s²

