

1. In troposphere (a layer of atmosphere) temperature decreases as we go up. This is due to

- A. Absorption of incoming solar radiation by CO₂.
- B. Vehicular emissions at ground level
- C. Absorption of outgoing radiation by atmosphere
- D. Due to rotation of earth on its axis.

Correct Answer: C

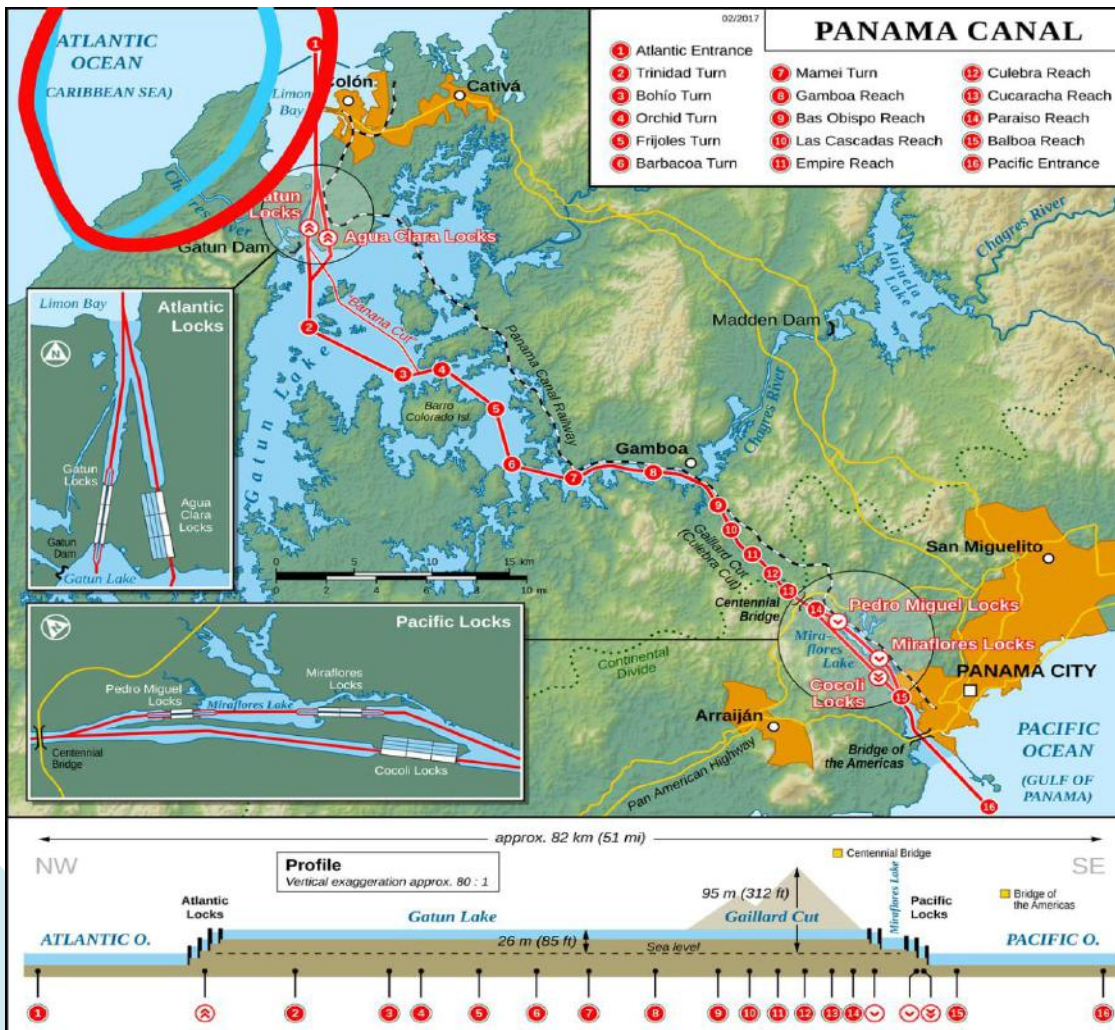
Explanation: In the troposphere, the temperature generally decreases with altitude. The reason is that the troposphere's gases absorb very little of the incoming solar radiation. Instead, the ground absorbs this radiation and then heats the tropospheric air by conduction and convection from below.

2. Panama canal connects which two water bodies.

- A. Caribbean sea & Atlantic Ocean
- B. Arctic ocean and Pacific ocean
- C. North American rivers & South American rivers
- D. Pacific ocean and Caribbean sea

Correct Answer: D

Explanation: Refer to the image below



3. Which among the following is/are correct :

1. Erosion is the in-situ process.
2. Erosion involves transport of weathered materials.
3. Weathering and erosion both can occur together.
4. In weathering broken materials pile up.

- A. 2 3 and 4only
- B. 1 2 and 3 only
- C. 1 and 3 only
- D. All of the above

Correct Answer: A

Explanation: Erosion involves transport of materials; hence it is not an in-situ process. Hence statement 1 is wrong.

4. Weathering of rocks can be due to :

1. Freeze - thaw cycle
2. Activities of plants, animals & Bacteria
3. Hydrolysis
4. In tropical areas due to day and night cycle.

- A. 2 3 and 4 only
- B. 1 2 and 3 only
- C. 1 and 3 only
- D. All of the above

Correct Answer: D

Explanation: Bacteria and fungi can also be the agent of weathering.

5. Which of the following lake was created due to a meteorite?

- A. Chilika Lake
- B. Lonar Lake
- C. Pulicat Lake
- D. Vembanad Lake

Correct Answer: B

Explanation: Formed 35,000 to 50,000 years ago, after a meteorite hit the Earth, Lonar is the only “fresh” impact structure in basalt on Earth, making it an important analog for impact craters on the surface of the Moon.

6. Which among the following is NOT correctly matched :

1. Rockies - North America
2. Lake Titicaca - North America
3. Andes - South America
4. Appalachian – Eurasia

- A. 2 and 4 only
- B. 1 2 and 3 only
- C. 1 and 3 only
- D. All of the above

Correct Answer: A

Explanation: Lake Titicaca is located on the border of Bolivia and Peru. The Appalachian Mountains are a system of mountain ranges running along the eastern coast of North America from Newfoundland and Labrador, Canada, in the north to Alabama, USA, in the south.

7. In relation to landforms, which among the following is correct about the idea - "Present is the key to the past".

1. Uniform, continuous process that are acting on landforms today were also acting in the past.
 2. This is based on the concept of Uniformitarianism.
 3. It accounts for endogenic forces only.
 4. The better one understands current day processes, the easier it will be to understand the past.
- A. 2 3 and 4 only
 - B. 1 2 and 4 only
 - C. 1 and 3 only
 - D. 1 only

Correct Answer: B

Explanation: Refer NCERT class discussion/notes

8. Stars twinkle for which of the following reasons:

1. Distance.
2. Temperature
3. Size of the star
4. Atmospheric refraction of light

Which of the above are correct?

- A. 1 and 2 only
- B. 3 and 4 only
- C. 2 and 4 only
- D. All of the above

Correct Answer: D

9. Which of the following statements is/are correct?

1. A Satellite is a celestial body that moves around the planets in the same way as the planets move around the sun.
2. Stars have their own heat and light which they emit in large amounts.

Which of the statements given above is/are correct?

- A.1 only
- B.2 only
- C.Both 1 and 2
- D.Neither 1 nor 2

Correct Answer: C

Explanation: Refer NCERT class discussion/notes

10. Which of the following statements is/are correct?

1. Mars is considered as 'Earth's-twin' because its size and shape are very much similar to that of the earth.
2. Venus takes only about 88 days to complete one round along its orbit.

Select the correct answer using the code given below:

Which of the statements given above is/are correct?

- A.1 only
- B.2 only
- C.Both 1 and 2
- D.Neither 1 nor 2

Correct Answer: D

Explanation: Venus is considered as 'Earth's twin'. Venus takes 225 days to complete one round along its orbit, while mercury, the nearest planet to the sun, takes 88 days to complete one round along its orbit.

11. Which celestial bodies are called stars?

- A. Those which are large in size.
- B. Those which have their own heat and light
- C. Those which do not have their own heat and light.
- D. Those which revolve around other bodies rotating on their axis.

Correct Answer: B

Explanation: Some celestial bodies are very big and hot. They are made up of gases. They have their own heat and light, which they emit in large amounts. These celestial bodies are called stars.

12. Ursa Major or Big Bear is related to

- A. Solar System
- B. Constellation

4

- C. Asteroids groups
- D. None of these

Correct Answer: B

Explanation: Ursa Major or Big Bear is a constellation. One of the most easily recognisable constellations is the Saptarishi, is a part of Ursa Major constellation.

13. Consider the following assertion and reason:

1. Assertion: Rotation period of Mercury around the Sun is the shortest among all planets of the Solar System.
 2. Reason: Mercury is the nearest planet to the Sun.
- A. Both the Assertion and the Reason are correct and the Reason is the correct explanation of the Assertion.....
 - B. The Assertion and the Reason are correct but the Reason is not the correct explanation of the Assertion.
 - C. The Assertion is correct but the Reason is not correct.
 - D. The Assertion is not correct but the Reason is correct.

Correct Answer: D

Explanation: Mercury is the nearest planet to the Sun in the solar system, which is why it has the shortest orbital period (Revolution period) around the sun, that is 88 days. Hence statement 1 is wrong.

14. The asteroid belt is found between which of the following planets?

- A. Mercury and Venus
- B. Venus and Earth
- C. Earth and Mars
- D. Mars and Jupiter

Correct Answer: D

Explanation: Apart from the stars, planets and satellites, there are numerous tiny bodies which also move around the Sun. These bodies are called asteroids. They are found between the orbits of Mars and Jupiter. Scientists are of the view that asteroids are parts of a planet which exploded many years back.

15. Which of the following statements is/are correct?

1. The sun provides the pulling force that binds the solar system.
 2. The sun is the ultimate source of heat and light for the solar system.
- A. 1 only
 - B. 2 only
 - C. Both 1 and 2
 - D. Neither 1 nor 2

Correct Answer: C

Explanation: The sun is in the centre of the solar system. It is huge and made up of extremely hot gases. It provides the pulling force that binds the solar system. The sun is the ultimate source of heat and light for the solar system. But that tremendous heat is not felt so much by us because despite being our nearest star, it is far away from us. The sun is about 150 million km away from the earth and Sunlight takes 8 minutes to reach the Earth.

16. Consider the following assertion

and reason:

Assertion: Only one side of the moon is visible to us on the earth.

Reason: The time taken to complete one rotation of the earth through the Moon is more than the time it takes to complete one revolution on its axis.

- A. Both the Assertion and the Reason are correct and the Reason is the correct explanation of the Assertion.
- B. The Assertion and the Reason are correct but the Reason is not the correct explanation of the Assertion.
- C. The Assertion is correct but the Reason is not correct
- D. The Assertion is not correct but the Reason is correct.

Correct Answer: C

Explanation: The moon revolves around the earth in about 27 days. It takes exactly the same time to complete one spin. Therefore, the time taken to complete one revolution of the earth by the moon is equal to the time taken to complete one rotation on its axis. As a result, only one side of the moon is visible to us on the earth. This is called tidal locking.

17. The term 'Goldilocks Zone' is often seen in the news in the context of

- A. the limits of habitable zone above the surface of the Earth
- B. regions inside the Earth-like planets in outer space
- C. search for the Earth-like planets in outer space
- D. search for meteorites containing precious metals

Correct Answer: C

Explanation: Refer NCERT class discussion/notes

18. Consider the following assertion and reason:

Assertion: The shape of the earth is described as Geoid.

Reason: Earth is slightly flattened at the poles.

- A. Both the Assertion and the Reason are correct and the Reason is the correct explanation of the Assertion.
- B. The Assertion and the Reason are correct but the Reason is not the correct explanation of the Assertion.
- C. The Assertion is correct but the Reason is not correct.
- D. The Assertion is not correct but the Reason is correct.

Correct Answer: A

Explanation: The Earth is slightly flattened at the poles and bulged near the equator. That is why, its shape is described as a Geoid. Geoid means an earth-like shape.

19. Consider the following statements given below:

1. The small pieces of rocks which move around the sun are called meteoroids.
2. The whitish glowing path across the sky from one end to another, which is a cluster of millions of stars. This band is called the Milky Way.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2

6

D. Neither 1 nor 2

Correct Answer: C

Explanation: The question is self-explanatory

20. Which of the following statements is/are correct?

1. The Torrid Zone receives the maximum heat.
2. The angle of the sun's rays goes on increasing towards the poles.

Select the correct answer using the code given below:

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: A

Explanation: Refer NCERT class discussion/notes

21. Regarding the Equator, consider the following statements:

1. The equator represents the zero degree latitude.
2. Each point of the equator is equidistant from both poles.
3. The angular distance of the north or south pole from the equator is called longitude.

Which of the statements given above are correct?

- A. 1 and 2 only
- B. 1 and 3 only
- C. 2 and 3 only
- D. All of the above

Correct Answer: A

Explanation: The angular distance of north or south from the equator is called latitude. It is measured in degrees from both poles. All parallel circles from the equator up to the poles are called parallels of latitudes. The equator is an imaginary circular line which divides the earth into two parts.

22. Match List - I with List - II

List - I	List - II
A. Tropic of Cancer	1. $66\frac{1}{2}^\circ$ South
B. Tropic of Capricorn	2. $23\frac{1}{2}^\circ$ North
C. Arctic Circle	3. $23\frac{1}{2}^\circ$ South
D. Antarctic Circle	4. $66\frac{1}{2}^\circ$ North

Code:

A B C D

- A. 1 2 3 4
- B. 2 4 3 1

7

- C. 2 3 4 1
- D. 3 2 4 1

Correct Answer: C

Explanation: Refer NCERT class discussion/notes

23. If a place is located 20° east from Greenwich, then what will be the difference between Greenwich and the time of that place?

- A. 1 hour
- B. 1 hour and 20 minutes
- C. 1 hour and 30 minutes
- D. Will have the same time

Correct Answer: B

Explanation: 1° longitude = 4 minutes

20° longitude = $20 \times 4 = 80$ minutes = 1 hour and 20 minutes

Since place is East of Greenwich, it will be ahead by 1 hr 20 minutes.

24. What is the difference between India Standard Time and Greenwich Mean Time?

- A. 5 hours 30 minutes ahead
- B. 5 hours 30 minutes behind
- C. 6 hours 30 minutes behind
- D. 4 hours 30 minutes ahead

Correct Answer: A

Explanation: India Standard Time is $82^\circ 30'$ east of Greenwich. So, the time here is 5 hours 30 minutes ahead of the time of Greenwich, because it is east of Greenwich. Therefore, when it is 2 pm in London, then it will be 7:30 pm in India.

25. Which of the following statements is/are correct?

1. The Prime Meridian and 180° meridian divide the earth into two equal halves, the Eastern Hemisphere and the Western Hemisphere.
2. 180° East and 180° West meridians are on the same line.

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation: The Prime Meridian and 180° meridian divide the earth into two equal halves, the Eastern Hemisphere and the Western Hemisphere. Therefore, the longitude of a place is followed by the letter E for the east and W for the west. 180° East and 180° West meridians are on the same line and 180° longitudes is also known as International Date

Line.

26. Consider the following statements:

- (i) The earth rotates & spins around its axis, which takes a day.
- (ii) The earth is tilted at an angle of 23.5 degrees.
- (iii) The rotation of the earth causes changes from day to night & also changes in seasons.

Which of the above are true?

- A. i & ii
- B. ii & iii
- C. iii only
- D. All of the above

Correct Answer: D

Explanation: Refer NCERT class discussion/notes

27. Tropic of Cancer passes through which of the following Indian States?

- 1. Rajasthan,
- 2. Gujarat
- 3. Chhattisgarh
- 4. Mizoram.
- 5. Assam
- 6. Bihar

Options:

- A. 1 2 and 4 only
- B. 1 5 and 5 only
- C. 1 2 3 and 4 only
- D. 4 5 and 6 only

Correct Answer: C

Explanation: The Tropic of Cancer passes through eight states in India: Gujarat (Jasdan), Rajasthan (Kalinjarh), Madhya Pradesh (Shajapur), Chhattisgarh (Sonhat), Jharkhand (Lohardaga), West Bengal (Krishnanagar), Tripura (Udaipur) and Mizoram (Champhai).

28. With reference to solstice, consider the following statements:

- 1. In winter Solstice, on 22nd December the sun's rays fall vertically at the Tropic of Cancer.
- 2. In Summer Solstice, on 21st June the sun's rays fall vertically at the Tropic of Capricorn.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: D

29. With reference to the Winter Solstice, consider the following statements:

1. The South Pole tilts towards the sun.
2. The rays of the sun fall directly on the Tropic of Capricorn.
3. In the southern hemisphere, there are seasons with longer nights and shorter days.

Which of the statements given above are correct?

- A. 1 and 3 only
- B. 2 and 3 only
- C. 1 and 2 only
- D. All of the above

Correct Answer: C

Explanation: On 22nd December, the Tropic of Capricorn receives direct rays of the sun as the South Pole tilts towards it. As the sun's rays fall vertically at the Tropic of Capricorn ($23\frac{1}{2}^{\circ}$ S), a larger portion of the Southern Hemisphere gets light. Therefore, it is summer in the Southern Hemisphere with longer days and shorter nights. This position of the earth is called the Winter Solstice. It is noted that Christmas is celebrated in Australia in the summer season.

30. With reference to the Equinox, consider the following statements

1. In this position, direct rays of the sun fall on the equator.
2. The whole earth experiences equal days and equal nights.
3. Neither of the poles is tilted towards the sun.

Code:

- A. 1 and 2 only
- B. 1 and 3 only
- C. 2 and 3 only
- D. All of the above

Correct Answer: D

Explanation: Circle of illumination divides all the latitudes in two equal halves. So, there is equal day and night everywhere. On 21st March and September 23rd, direct rays of the sun fall on the equator. This is called an equinox. On 23rd September, it is autumn season in the Northern Hemisphere and spring season in the Southern Hemisphere. The opposite is the case on 21st March.

31. Through which of the following cities Indian standard meridian passes?

1. Jabalpur, Madhya Pradesh
2. Ujjain, Uttar Pradesh
3. Mirzapur, Uttar Pradesh

Select the correct answer from the following codes

- A. Only 3
- B. Only 1 and 2
- C. Only 2 and 3

D. 1,2 and 3

Correct Answer: A

Explanation: Refer NCERT class discussion/notes

32. Equator passes through which of the following countries?

1. Venezuela
2. Ecuador
3. Colombia
4. Brazil

Select the correct option from codes given below:

- A. 2 3 and 4
- B. 1 2 and 3
- C. 2 and 3 only
- D. 2 and 4 only

Correct Answer: A

Explanation: The equator passes through 13 countries: Ecuador, Colombia, Brazil, Sao Tome & Principe, Gabon, Republic of the Congo, Democratic Republic of the Congo, Uganda, Kenya, Somalia, Maldives, Indonesia and Kiribati.

33. Which African river crosses the equator two times?

- A. Zambezi
- B. Nile River
- C. Senegal
- D. Zaire/Congo River

Correct Answer: D

Explanation: The Zaire/Congo river is located in the continent of Africa and cuts the equator two times.



34. With reference to maps, what are conventional symbols?

- A. There is an international agreement regarding the use of those symbols...
- B. There is national level agreement regarding the use of those symbols
- C. Those symbols by which natural forms are reflected
- D. All of the above

Correct Answer: A

Explanation:

There are three Components of Maps – distance, direction and symbol. It is the third important component of a map. By using symbols, it is easier to draw the map and study them. Maps have a universal language. There is an international agreement regarding the use of these symbols. These are called conventional symbols. Such as- railway lines, paved roads, Church and raw roads, etc.

35. With reference to maps, which directions are called cardinal points?

- 1. North
- 2. South
- 3. East
- 4. West

Code:

- A. 1, 2 and 3 only
- B. 2, 3 and 4 only
- C. 1 and 2 only
- D. All of the above

Correct Answer: D

Explanation: The four major directions of the map, such as North, South, East and West are called Cardinal Points. Other four intermediate directions are north-east (NE), south-east (SE), south-west (SW) and north-west (NW). We can locate any place more accurately with the help of these intermediate directions.

36. What are included in Physical Map?

1. Mountains
2. Plateaus
3. Plains
4. Oceans

Boundaries of states or countries

- A. 1, 3 and 5 only
- B. 1, 2, 4 and 5 only
- C. 1, 2, 3 and 4 only
- D. All of the above

Correct Answer: C

Explanation: Maps showing natural features of the earth such as mountains, plateaus, plains, rivers, oceans etc. are called physical maps.

37. Which of the following are correct?

1. India has one time zone
2. Russia has 11 time zones
3. USA and Canada have 5 time zones

- A. 1 only
- B. 2 and 3 only
- C. 3 only
- D. 1 and 2 only

Correct Answer: D

Explanation: Refer NCERT class discussion/notes

38. Which domains are included in Biosphere?

- A. Lithosphere and Hydrosphere
- B. Hydrosphere and Atmosphere
- C. Lithosphere and Atmosphere
- D. Lithosphere, Hydrosphere and Atmosphere

Correct Answer: D

Explanation: That narrow zone of the earth where all domains come to contact is called Biosphere. In this domain, all kind of species of organisms are found, so it is the most important. The interaction of these three domains of the Earth and they affect the other in some way.

39. According to the size of the earth's continents, what is the correct order?

- A. Asia> Africa> Europe> North
- B. Asia> North America> South America> Africa> Europe
- C. Asia> Africa> North America> South America > Europe
- D. Asia> Europe> Africa> North America> South America

America> South America

Correct Answer: C

Explanation: According to the sizes of the earth's continents, the correct order of continents are – Asia, Africa, North America, South America, Antarctica, Europe and Australia.

40. Regarding Antarctica continent, which of the following statements are correct?

- 1. Its area is more than the combined area of Europe and Australia.
- 2. The South Pole is located on the eastern edge of this continent.

There is no permanent human settlements of any kind here.

- A. 1 and 2 only
- B. 2 and 3 only
- C. 1 and 3 only
- D. 1, 2 and 3

Correct Answer: C

Explanation: Antarctica, completely in the Southern Hemisphere, is a huge continent. The South Pole lies almost at the centre of this continent. As it is located in the South Polar Region, it is permanently covered with thick ice sheets. There are no permanent human settlements. Many countries have research stations here. India also has research stations here. These are named as Maitri and Dakshin Gangotri.

41. Consider the following assertion and reason:

Assertion: The coastline of Atlantic Ocean provides ideal location for natural harbours and ports.

Reason: The coastline of the Atlantic Ocean is straight and wide

Code:

- A. Both the Assertion and the Reason are correct and the Reason is the correct explanation of the Assertion.
- B. The Assertion and the Reason are correct but the Reason is not the correct explanation of the Assertion.
- C. The Assertion is correct but the Reason is not correct
- D. The Assertion is not correct but the Reason is correct.

Correct Answer: C

Explanation: The Atlantic Ocean is the second largest Ocean in the world. It is flanked by the North and South Americas on the western side, and Europe and Africa on the eastern side. The coastline of Atlantic Ocean is highly indented. This irregular and indented coastline provides ideal location for natural harbours and ports.

42. Match List-I with List-II and select the correct answer:

List-I

List-II

A.Pacific Ocean

1.Triangular in shape

- B. Atlantic Ocean 2. 'S' shaped
C. Indian Ocean 3. Almost Circular
D. Arctic Ocean 4. Around the North Pole

Code:

A B C D

- A. 2 3 1 4
B. 3 2 1 4
C. 1 4 3 2
D. 3 1 2 4

Correct Answer: B

Explanation:

- The Pacific Ocean is almost circular in shape. Asia, Australia, North and South Americas surround it.
- The Atlantic Ocean is 'S' shaped.
- The Indian Ocean is the only ocean named after a country, that is, India. The shape of ocean is almost triangular. In the north, it is bound by Asia, in the west by Africa and in the east by Australia.
- The Arctic Ocean is located within the Arctic Circle ($66\frac{1}{2}^{\circ}$ N) and surrounds the North Pole.

43. The terrestrial structure that divides Asia and Europe include(s):

1. Ural Mountains
 2. Ural River
 3. Caucasus Mountains
- A. 1 Only
B. 2 and 3 only
C. 1 and 2 only
D. All of the above

Correct Answer: C

Explanation: Europe and Asia are seen as the same terrain which is separated from each other only through the Ural Mountains and the Ural River. But practically, Europe and Asia are considered as two separate continents. The combined landmass of Europe and Asia is called Eurasia (Europe + Asia).

44. With reference to South America continent, consider the following statements:

1. The Pacific Ocean in the east and the Atlantic Ocean to the west of this continent.
2. The Andes, world's longest mountain range, runs through its length from north to south
3. The Amazon River, the largest river in the world, flows in this continent.

Which of the statements given above is/are correct?

- A. 1 and 2 only
B. 2 and 3 only
C. 1 and 3 only

D. All of the above

Correct Answer: B

Explanation: The Atlantic Ocean is in the east and the Pacific Ocean to the west of this continent. Most part of the continent of South America is located in the southern hemisphere.

45. Which continent is called island continent?

- A. North America
- B. Antarctica
- C. Europe
- D. Australia

Correct Answer: D

Explanation: Australia is called an island continent. It is surrounded on all sides by the oceans and seas. Australia is the smallest continent of the world, that lies entirely in the Southern Hemisphere.

46. Mark the correct order on the basis of geological time scale (age of the features).

Eastern ghats > Aravalli > Ural > Himalayas

Eastern ghats > Ural > Himalayas > Aravalli

Himalayas > Eastern ghats > Aravalli > Ural

Eastern ghats > Aravalli > Himalayas > Ural

Correct Answer: A

Explanation: Refer NCERT class discussion/notes

47. Time at 77° East is 10 AM (Sunday) . What will be the time at 74° West.

10:56 PM (Saturday)

11:56 PM (Saturday)

11:56 AM (Friday)

12:56 PM (Friday)

Correct Answer: B

Explanation: Refer NCERT class discussion/notes

48. Which is the most tropical continent.?

Africa

South America

Asia

Australia

Correct Answer: A

Explanation: Africa is the most equatorial of all continents because the equator divides the continent in nearly two equal halves.

tropical of all continents because the

49. Where does the Yangtze River flows?

- A. China
- B. Mongolia
- C. Russia
- D. North America

Correct Answer: A

Explanation: Refer the image below



50. Identify the waterfalls of plateau areas from the following waterfalls:

1. Hundru falls
2. Jog falls
3. Shivanasamudra falls
4. Dhuandhar falls

- A. 1 only
- B. 2 and 3 only
- C. 1 and 2 only
- D. 3 and 4 only

Correct Answer: C

Explanation: In the plateau areas, there may be several waterfalls as the river falls from a great height. The Hundru falls in the Chhota nagpur plateau on the river Subarnarekha and the Jog falls in Karnataka on the sharavathi river are examples of such waterfalls. The Jog falls is the highest waterfall in India. Shivanasamudra falls in Karnataka is located on Kaveri river and Dhuandhar falls in Jabalpur district of Madhya Pradesh is located on Narmada river.

51. Mithi river flows in:

17

- A. Maharashtra
- B. Gujarat
- C. Karnataka
- D. Punjab

Correct Answer: A

Explanation: The Mithi River is a river on Salsette Island, the island of the city of Mumbai, Maharashtra. It is a confluence of tail-water discharges of the Powai and Vihar lakes.

In news: BMC to prepare master plan to create tourism facilities around Mithi river.

52. Aarey forest land falls under the eco-sensitive zone of which of the following national park?

- A. Sanjay Gandhi National Park
- B. Nagarhole National Park
- C. Gugamal National Park
- D. Balpakram National Park

Correct Answer: A

Explanation :

Maharashtra Chief Minister announced that the state government would designate a 600-acre parcel of land in the heart of urban Mumbai as a reserved forest.

- Under Section 4 of The Indian Forest Act, 1927, the state government can “constitute any land a reserved forest” by issuing a notification in the Official Gazette.
- Under the law, the government must also appoint a Forest Settlement Officer (FSO) “to determine the rights alleged to exist in favour of any person in or over any land comprised within such limits or in or over any forest-produce, and to deal with the same”.
-

Hence, option (a) is the correct answer.

53. Consider the following statements regarding the Mission Karmayogi:

1. The mission emphasizes on ‘on-site learning’ to complement the ‘off-site’ learning of the civil servants.
2. It is to be delivered by setting up an Integrated Government Online Training (iGOT Karmayogi) Platform.
3. A Public Human Resources Council under the chairmanship of the Prime Minister to be set up.

Which of the statements given above is/are correct?

- A. 1 and 2 only
- B. 2 and 3 only
- C. 1 and 3 only
- D. All of the above

Correct Answer: D

Explanation :

The Union Cabinet has approved launching of "Mission Karmayogi"- National Programme for Civil Services Capacity Building (NPCSCB). NPCSCB has been designed to lay the foundations for capacity building for Civil Servants so that they remain entrenched in Indian Culture and sensibilities and remain connected, with their roots, while they learn from the best institutions and practices across the world. The Programme will be delivered

54. The Thai Canal, also known as Kra Canal or Kra Isthmus Canal, refers to proposals for a canal that would connect:

- A. Gulf of Thailand with the Andaman Sea
- B. Andaman sea and Java sea
- C. South China Sea and celeb's sea
- D. Gulf of Thailand and Java sea

Correct Answer: A

Explanation:

The Thai Canal (also known as the Kra Canal) is a proposed canal that would cut across the Malay Peninsula in Southern Thailand. This man-made waterway would connect the Andaman Sea with the Gulf of Thailand, providing a maritime shortcut by rerouting shipping away from the Strait of Malacca. The canal of approximately 100 km would save 1200 km on the current journey via Singapore.

55. Crete Island, recently seen in news, is located in:

- A. Red Sea
- B. Black Sea
- C. Mediterranean Sea
- D. Yellow Sea

Correct Answer: C

Explanation :

Turkey's Foreign Minister has renewed call for dialogue with rival Greece that would lead to the fair sharing of resources in the eastern Mediterranean, where the two countries are locked in a tense standoff.

Both countries' forces have been conducting military exercises in the seas between Cyprus and the Greek island of Crete.

Crete is the largest and most populous of the Greek islands and the fifth largest island in the Mediterranean Sea, after Sicily, Sardinia, Cyprus and Corsica. It bounds the southern border of the Aegean sea.

56. A health assistant Robot Rakshak which can remotely communicate between doctor and patient, was recently developed by:

- A. Indian Railways
- B. CSIR
- C. DRDO
- D. None of the above

Correct Answer: A

Explanation :

In the fight against the spread of Covid 19 pandemic, the Railways has designed a health assistant Robot Rakshak which can remotely communicate between doctor and patient.

57. With reference to the Question Hour, consider the following statements:

1. Question Hour in Rajya Sabha is held only on alternative days of the session.

held only on alternative days of the session.

2. There is no Question Hour on the day the President addresses MPs from both Houses in the Central Hall.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: B

Explanation :

The Lok Sabha and Rajya Sabha secretariats notified that there will be no Question Hour during the Monsoon Session of Parliament, which has been truncated to September 14-October 1 in view of the Covid-19 pandemic, and that Zero Hour will be restricted in both Houses. Opposition MPs have criticised the move, saying they will lose the right to question the government.

- It is during Question Hour that Members of Parliament ask questions of ministers and hold them accountable for the functioning of their ministries. The questions that MPs ask are designed to elicit information and trigger suitable action by ministries.
- Prior to Independence, the first question asked of government was in 1893. It was on the burden cast on village shopkeepers who had to provide supplies to touring government officers.
- Parliament has comprehensive rules for dealing with every aspect of Question Hour. And the presiding officers of the two houses are the final authority with respect to the conduct of Question Hour.
- Question Hour in both Houses is held on all days of the session. But there are two days when an exception is made.
 - There is no Question Hour on the day the President addresses MPs from both Houses in the Central Hall.
 - Question Hour is not scheduled either on the day the Finance Minister presents the Budget.

Hence only statement 2 is correct.

58. With reference to the sero-survey, consider the following statements:

1. Indian Council of Medical Research, ICMR and National Centre for Disease Control have initiate a population-based sero-survey in selected districts to monitor the trend in prevalence of COVID-19 infection at district level.
2. A sero-survey involves testing of blood serum of a group of individuals and this will be used to monitor trends in prevalence of the novel coronavirus, or SARS-COV-2, infection at the district level.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation :

Indian Council of Medical Research, ICMR and National Centre for Disease Control are going to initiate a population-based sero-survey in selected districts to monitor the trend in prevalence of COVID-19 infection at district level. A sero-survey involves testing of blood serum of a group of individuals and this will be used to monitor trends in prevalence of the novel coronavirus, or SARS-COV-2, infection at the district level. The

agencies will use a combination of RT-PCR and Elisa antibody kits for these surveys. The facility-oriented surveillance is an expansion of the testing of flu and serious respiratory cases in hospitals being carried out by the government. The surveillance will be conducted by the Indian Council of Medical Research and the National Centre for Disease Control in collaboration with key stakeholders and state health departments. **Hence both statements are correct.**

59. Which of the following countries participated in ministerial meeting on supply chains in the Indo Pacific region?

1. India
2. Japan
3. Australia

Select the correct answer using the code given below:

- A. 1 only
- B. 1 and 2 only
- C. 2 and 3 only
- D. 1, 2 and 3

Correct Answer: D

Explanation :

Australia-India-Japan Ministers' meeting on Supply Chains Resilience was held.

- The ministerial-level meeting on Supply Chains was attended by Commerce and Industry Minister Piyush Goyal, Australia's Minister for Trade, Tourism and Investment and Japan's Minister of Economy, Trade, and Industry.
- They underscored the necessity and potential to enhance the resiliency of supply chains in the Indo-Pacific region.
- Recognizing the pressing need for regional cooperation on supply chain resilience in the Indo-Pacific, the Ministers shared their intention to work toward the launch of a new initiative to achieve the objective through cooperation.
- The details of the new initiative slated for launch later this year will be worked out by senior officials.
- The ministers also invited other like-minded countries in the region to participate in the initiative.
- **Hence, option (d) is the correct answer.**

60. Consider the following statements with reference to the Green Term Ahead Market (GTAM):

1. Transactions through GTAM will be bilateral in nature with clear identification of corresponding buyers and sellers, there will not be any difficulty in accounting for Renewable Purchase Obligations (RPO).
2. GTAM contracts will be segregated into Solar RPO & Non-Solar RPO as RPO targets are also segregated.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation :

As a first step towards Greening the Indian short term power Market, the Union Minister of State (IC) Power and New & Renewable Energy launched pan-India Green Term Ahead Market (GTAM) in electricity.

- The market is first Exclusive product for renewable energy sector in the world.

- Transactions through GTAM will be bilateral in nature with clear identification of corresponding buyers and sellers, there will not be any difficulty in accounting for Renewable Purchase Obligations (RPO).
- GTAM contracts will be segregated into Solar RPO & Non-Solar RPO as RPO targets are also segregated.
- Further, within the two segments GTAM contracts will have Green Intraday, Day Ahead Contingency, Daily and Weekly Contracts
- Green Intraday Contract & Day Ahead Contingency Contract – Bidding will take place on a 15-minute time-block wise MW basis.
- Price discovery will take place on a continuous basis i.e. price time priority basis. Subsequently, looking at the market conditions open auction can be introduced for daily & weekly contracts.
- Energy scheduled through GTAM contract shall be considered as deemed RPO compliance of the buyer.
- **Hence both statements are correct.**

61. Consider the following statements with reference to the Indian Economy:

1. GDP in the April-June quarter of 2020-21 slumped 23.9% compared with growth of 3.1% in the previous (January-March) quarter.
2. The manufacturing sector, which has been in the grip of a sharp slowdown, fell 39.3% in the June quarter while construction slumped 50.3% during the (January-March) period.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation :

Data released by the National Statistical Office (NSO) showed GDP in the April-June quarter of 2020-21 slumped 23.9% compared with growth of 3.1% in the previous (January-March) quarter.

The manufacturing sector, which has been in the grip of a sharp slowdown, fell 39.3% in the June quarter while construction slumped 50.3% during the three-month period.

Hence both statements are correct.

News: <https://timesofindia.indiatimes.com/business/india-business/gdp-collapses-23-9-in-q1-worst-among-big-economies/articleshow/77860877.cms>

62. With reference to the US-India Strategic Partnership Forum (USISPF) 3rd Annual Leadership Summit, consider the following statements:

1. It is a non-profit organization that works for the partnership between India and the U.S.
2. The theme of this year is “US-India Navigating New Challenges”.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation :

Prime Minister Narendra Modi shall deliver the Special Key Note Address at the USISPF 3rd Annual Leadership Summit on the 3rd September 2020, through video conference.

- The US-India Strategic Partnership Forum (USISPF) is a non-profit organization that works for the partnership between India and the U.S.
- The Theme of the 5 day Summit that began on the 31st of August is “US-India Navigating New Challenges”.
- The theme covers various subjects such as India’s potential in becoming a Global Manufacturing Hub, Opportunities in India’s Gas Market, Ease of Doing Business to attract FDI in India, Common Opportunities & Challenges in Tech Space, Indo-Pacific Economic issues etc.

Hence both statements are correct.

63. With reference to the National Initiative for Developing and Harnessing Innovations (NIDHI) programme-Entrepreneurs in Residence (EIR) program, consider the following statements:

1. It was launched by NITI Aayog.

2. The NIDHI-EIR programme provides tremendous opportunities for innovative entrepreneurs to expand their networks and get critical feedback on their ventures in order to promote their entrepreneurial career goals and aspirations.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: B

Explanation :

A brochure featuring Entrepreneurs in Residence (EIR) under the National Initiative for Developing and Harnessing Innovations (NIDHI) programme was launched by Department of Science & Technology (DST) Secretary.

- The brochure brought out by Venture Center, details what the EIRs are working on and some highlights about them. It is also meant to be a directory of all EIRs. All contributing project execution partners are also featured in the brochure.
- Entrepreneurs-in-Residence (EIR) Programme is under National Initiative for Developing and Harnessing innovations (NIDHI) of Department of Science and Technology.
- It supports aspiring entrepreneur for pursuing a promising technology business idea over a period up to 18 months with a subsistence grant up to Rs 30000 per month with a maximum cap for total support of Rs 3.6 lakh to each EIR over a maximum of 18 months.
- The NIDHI-EIR programme provides tremendous opportunities for innovative entrepreneurs to expand their networks and get critical feedback on their ventures in order to promote their entrepreneurial career goals and aspirations.

Hence only statement 2 is correct.

64. What is the difference between strait and Isthmus?

- A. Strait is a naturally formed, narrow, typically navigable waterway that connects two larger bodies of water whereas Isthmus is narrow strip of land connecting two large land areas otherwise separated by the sea
- B. Strait is a portion of the ocean that penetrates land. Gulfs vary greatly in size, shape, and depth whereas Isthmus is a high point of land that extends into a river, lake, or ocean.
- C. Both A & B
- D. None of the above

Correct Answer: A

Explanation: Strait is a naturally formed, narrow, typically navigable waterway that connects two larger bodies of

water whereas Isthmus is narrow strip areas otherwise separated by the sea.

of land connecting two large land

65. The Lake Titicaca (highest navigable lake in the world) is on the border of ____?

- A. Brazil and Bolivia
- B. Peru and Bolivia
- C. Chile and Colombo
- D. Chile and Suriname

Correct Answer: B

Explanation: Lake Titicaca, Spanish Lago Titicaca, the world's highest lake navigable to large vessels, lying at 12,500 feet (3,810 metres) above sea level in the Andes Mountains of South America, astride the border between Peru to the west and Bolivia to the east.

66. The term Open Market Operations is related with which of the following?

- A. Government Securities
- B. Foreign Exchange
- C. Gold Deposits
- D. Participatory Notes

Correct Answer: A

Explanation: Open market operations or OMOs are conducted by the Reserve Bank of India (RBI) by way of sale and purchase of Government Securities to and from the market. Hence A is the answer.

It is done with an objective to adjust the liquidity conditions in the market.

When the Reserve Bank feels that there is excess liquidity in the market, it resorts to sale of securities thereby sucking out the rupee liquidity.

Similarly, when the liquidity conditions are tight, RBI may buy securities from the market, thereby releasing liquidity into the market.

67. With reference to Deendayal Antyodaya Yojana-National Rural Livelihoods Mission (DAY-NRLM), consider the following statements:

1. The mission lays special emphasis on the financial inclusion of vulnerable communities.
2. It was launched by the Ministry of Rural Development.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation: Deendayal Antyodaya Yojana - National Livelihoods Mission (DAY-NRLM) aims at creating efficient and effective institutional platforms for the rural poor enabling them to increase household income through sustainable livelihood enhancements and improved access to financial services.

DAY-NRLM lays special emphasis on targeting the poorest of the poor and the most vulnerable communities and their financial inclusion. Hence, statement 1 is correct.

The mission was launched by the Ministry of Rural Development (MoRD), Government of India in 2011. Hence, statement 2 is correct.

In November 2015, the program (NRLM) was renamed Deendayal Antayodaya Yojana (DAY-NRLM).

National Rural Livelihood Mission

68. With reference to the East Asia Summit, which of the following is/are not correct?

1. It is based on the ASEAN Plus Six mechanism.
2. The members are from the continent of Asia only.

Choose the correct option from the codes given below:

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: B

Explanation: East Asia Summit (EAS) is an initiative of ASEAN and it consists of 18 countries.

EAS is a regional forum which initially had 16 countries of the East Asian, Southeast Asian, South Asian and Oceanian regions, based on the ASEAN Plus Six mechanism. Hence, statement 1 is correct.

However the membership was expanded to 18 countries including Russia and the United States at the Sixth EAS in 2011.

The concept of an East Asia Grouping was first promoted in 1991 by the then Malaysian Prime Minister, Mahathir bin Mohamad. Hence, statement 2 is not correct.

69. With reference to the Special Frontier Force, consider the following statements:

1. It was raised to prevent Chinese occupation at LAC.
2. It falls under the purview of the Ministry of Defense.
3. It is also referred to as Vikas Battalion.

Which of the statements given above is/are correct?

- A. 1 only
- B. 1 and 2 only
- C. 1 and 3 only
- D. 1, 2 and 3 only

Correct Answer: C

Explanation: The Special Frontier Force was established on 14th November 1962 in the immediate aftermath of the 1962 Sino-India war. It had been said to be instrumental in preventing Chinese occupation on the Line of Actual Control (LAC) in Ladakh. Hence, statement 1 is correct.

It falls under the purview of the Cabinet Secretariat where it is headed by an Inspector General who is an Army officer of the rank of Major General. Hence, statement 2 is not correct.

Though it is not part of the Army, they function under the operational control of the Army.

It had taken part in many operations conducted by Indian armed forces such as:

Operation Eagle (1971 war with Pakistan),

Operation Bluestar (clearing Amritsar's Golden Temple in 1984),

Operation Meghdoot (securing the Siachen glacier in 1984) and

Operation Vijay (war with Pakistan at Kargil in 1999) and many counter-insurgency operations in the country.

It was previously named Establishment-22 as it was raised by Major General Sujjan Singh Uban, an Artillery officer

who had commanded 22 Mountain

Regiment.

Now it is referred to as Vikas Battalion. Hence, statement 3 is correct.

70. INDRA series of exercise is conducted by India in association with which of the following countries?

- A. Russia
- B. U.S.A
- C. France
- D. Indonesia

Correct Answer: A

Explanation: The Indra series of exercises began in 2003 and was conducted as a bilateral naval exercise alternately between the two countries.

However, the first joint Tri-Services Exercise was conducted in 2017.

It is a joint exercise between Indian and Russia. Hence, option A is correct.

71. With reference to UNSC Resolution 1267 Sanctions Committee, consider the following statements:

- 1. The committee under resolutions 1267 can designate a person as global terrorists.
- 2. It is one of the most important and active UN subsidiary bodies working on efforts to combat terrorism.
- 3. Even a permanent five (P-5) member of UNSC can not use Veto against the decision of this committee.

Which of the statements given above is/are correct?

- A. 2 only
- B. 1 and 2 only
- C. 1 and 3 only
- D. 1, 2 and 3

Correct Answer: B

Explanation: UNSC Resolution 1267 Sanctions Committee oversees the implementation of sanctions pursuant to UNSC resolutions 1267.

The committee under resolutions 1267 can designate a person as global terrorists. Jaish-e-Mohammed chief Masood Azhar was listed as a global terrorist under the same resolution. Hence, statement 1 is correct.

It was adopted unanimously on 15th October 1999.

It is one of the most important and active UN subsidiary bodies working on efforts to combat terrorism, particularly in relation to Al Qaeda, Taliban and the Islamic State group. It prepares a consolidated list of people associated with these organizations. Hence, statement 2 is correct.

It discusses UN efforts to limit the movement of terrorists, especially those related to travel bans, the freezing of assets and arms embargoes for terrorism.

In 2019, Pakistan moved a proposal to declare four Indians working in Afghanistan as terrorists with links to Tehreek-e-Taliban Pakistan (TTP) and Jamaat-ul-Ahrar (JuA).

This proposal received a veto from the USA in UNSC. Veto power exists. Hence, statement 3 is not correct

72. Consider the following statements:

- 1. The mechanism of Question Hour is only limited to Loksabha.
- 2. Zero Hour is an Indian parliamentary innovation mentioned in the Constitution.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: D

Explanation: The first hour of every parliamentary sitting is slotted for the Question Hour.

Question Hour in both Houses is held on all days of the session. But there are two days when an exception is made.

However, in 2014 the Question Hour was shifted in the Rajya Sabha from 11 am to 12 noon. Hence, statement 1 is not correct.

During this one hour, Members of Parliament (MPs) ask questions to ministers and hold them accountable for the functioning of their ministries.

It is regulated according to parliamentary rules.

The presiding officers of the both Houses (Rajya Sabha and Lok Sabha) are the final authority with respect to the conduct of Question Hour.

Zero Hour is an Indian parliamentary innovation. It is not mentioned in the parliamentary rules book.

Under this, MPs can raise matters without any prior notice.

The zero hour starts immediately after the question hour and lasts until the agenda for the day (i.e. regular business of the House) is taken up. Hence, statement 2 is not correct.

73. Consider the following statements:

1. The government recently banned 118 more mobile applications, including the popular gaming app PUBG.
2. The decision to ban mobile apps taken under section 69A of the Information Technology Act and the relevant provisions of the Information Technology (Procedure and Safeguards for Blocking of Access of Information by Public) Rules 2009.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation : The government banned 118 more mobile applications, including the popular gaming app PUBG, that it said are prejudicial to the sovereignty and integrity of India.

- Among the other apps banned by the government are WeChat Work and WeChat Reading. The move comes amid fresh incursion bid by the Chinese troops at the Line of Actual Control.
- Earlier, the government had banned 59 popular Chinese apps including TikTok, CamScanner and UC Browser over security issues.
- The decision to ban such Apps was taken by the Ministry of Electronics and Information Technology which invoked it's power under section 69A of the Information Technology Act read with the relevant provisions of the Information Technology (Procedure and Safeguards for Blocking of Access of Information by Public) Rules 2009.
- The Indian Cyber Crime Coordination Centre of Home Ministry has also sent an exhaustive recommendation for blocking these malicious apps.
- **Hence both statements are correct.**

74. With reference to National Commission for Backward Classes, consider the following

statements:

1. It is a statutory body under the Ministry of Social Justice & Empowerment.
2. It has all the powers of a civil court while trying a suit.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: B

Explanation: 102nd Constitution Amendment Act, 2018 provides constitutional status to the National Commission for Backward Classes (NCBC).

This Constitutional body is under Article 338B of the Constitution of India under the Ministry of Social Justice & Empowerment. Hence, statement 1 is not correct.

It has the authority to examine complaints and welfare measures regarding socially and educationally backward classes.

Previously NCBC was a statutory body under the Ministry of Social Justice and Empowerment

Powers and Functions

The commission investigates and monitors all matters relating to the safeguards provided for the socially and educationally backward classes under the Constitution or under any other law to evaluate the working of such safeguards.

It participates and advises on the socio-economic development of the socially and educationally backward classes and to evaluate the progress of their development under the Union and any State.

It presents to the President, annually and at such other times as the Commission may deem fit, reports upon the working of those safeguards. The President laid such reports before each House of Parliament.

It has all the powers of a civil court while trying a suit. Hence, statement 2 is correct.

75. With reference to Environment Impact Assessment (EIA), consider the following statements:

1. EIA is a part of the formalised legal framework in India.
2. EIA emerged out of the Rio declaration in 1992.
3. Convention on Biological Diversity contains a requirement of EIA.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 and 3 only
- C. 1 and 2 only
- D. 1, 2 and 3

Correct Answer: D

Explanation: India is a party to the Rio declaration (also known as the Earth Summit) adopted by the United Nations Conference on Environment and Development (UNCED) in 1992, which articulated a catalogue of environmental principles including sustainable development, precautionary principle, and EIA.

Following the Rio Conference 1992, EIA became part of the formalised legal framework in India in 1994. Hence, statement 1 and 2 are correct.

India is also party to the Convention on Biological Diversity (CBD) and United Nations Framework on Climate

Change (UNFCCC), which contain a requirement to have a prior EIA in situations having a significant threat to the environment. Hence, statement 3 is correct.

76. Consider the following statements with respect to Kavkaz:

1. Kavkaz 2020 to be held in Astrakhan (Russia)
2. It is the tri-service exercise is part of a four-year exercise cycle of the Russian army

Which of the above statements is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation:

Kavkaz-2020 Exercise:

It is a strategic command-post exercise, and also known as Caucasus-2020.

The tri-service exercise is part of a four-year exercise cycle of the Russian army. Previous editions of the exercise were held in 2012 and 2016.

In 2020 it will be conducted in the Astrakhan province of Southern Russia.

Member countries of Shanghai Cooperation Organisation (SCO) and Central Asian countries would be participating.

77. Consider the following statements with respect to Poshan Maah:

1. The month of August is observed as Poshan Maah i.e. Nutrition month every year, since 2018.
2. It is implemented by Ministry of Women and Child Development.

Which of the above statements is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: B

Explanation:

Poshan Abhiyan:

It is also called as the National Nutrition Mission, it is Government of India's flagship programme to improve nutritional outcomes for children, pregnant women and lactating mothers. Poshan implies 'Prime Minister's Overarching Scheme for Holistic Nutrition'.

Under Poshan Abhiyaan, the month of September is observed as Poshan Maah i.e. Nutrition month every year, since 2018.

It includes a month-long activities focussed on antenatal care, optimal breastfeeding, anaemia, growth monitoring, girls education, diet, right age of marriage, hygiene and sanitation and eating healthy (food fortification).

The activities focus on Social and Behavioural Change Communication (SBCC) and are based on Jan Andolan Guidelines.

SBCC is the strategic use of communication approaches to promote changes in knowledge, attitudes, norms, beliefs and behaviours.

Jan Andolan is one of the strategies

under the Poshan Abhiyaan.

A food and nutrition quiz as well as meme competition will be organized on the My Gov portal.

A unique kind of nutrition park has been created at Statue of Unity (Gujarat), where one can witness nutrition related education along with fun and frolic.

Implemented by Ministry of Women and Child Development.

78. Consider the following statements:

1. National Statistical Office is formed by merging National Sample Survey Office (NSSO) with the Central Statistics Office (CSO)
2. National Statistical Office publishes Index of industrial production.

Which of the above statements is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation:

The National Sample Survey Office (NSSO) with the Central Statistics Office (CSO) under the Ministry of Statistics and Programme Implementation (MoSPI) is merged to form an overarching body National Statistical Office (NSO) through the merger of the NSSO and the CSO.

The order states that the proposed NSO would be headed by Secretary (Statistics and Programme Implementation), but skips any mention of National Statistical Commission (NSC), which has been the overseeing body for all the statistical work done in the country.

Index of Industrial production

The Index of Industrial Production (IIP) is an indicator that measures the changes in the volume of production of industrial products during a given period.

It is compiled and published monthly by the National Statistical Office (NSO), Ministry of Statistics and Programme Implementation.

IIP is a composite indicator that measures the growth rate of industry groups classified under:

Broad sectors, namely, Mining, Manufacturing, and Electricity.

Use-based sectors, namely Basic Goods, Capital Goods, and Intermediate Goods.

Base Year for IIP is 2011-2012.

79. Onam one of the major harvesting festival of which of the following state?

- A. Karnataka
- B. Kerala
- C. Tamil Nadu
- D. Andhra Pradesh

Correct Answer: B

Explanation:

Onam is the official state festival of Kerala. Onam is celebrated to honour the home-coming of a mythical-demon king Mahabali.

80. Consider the following statements:

1. International Commission of Jurists is an NGO
2. Geneva is the headquarters of International Court of Justice

Which of the above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Correct Answer: A

Explanation:

International Commission of Jurists

International Commission of Jurists is an international human rights non-governmental organization.

It is a standing group of 60 eminent jurists—including senior judges, attorneys and academics.

Its function is to develop national and international human rights standards through the law.

Headquarters is located at Geneva, Switzerland.

International Court of Justice

ICJ was established in 1945 by the United Nations charter and started working in April 1946.

It is the principal judicial organ of the United Nations, situated at the Peace Palace in The Hague (Netherlands).

Unlike the six principal organs of the United Nations, it is the only one not located in New York (USA).

81. Consider the following statements with respect to Mass Spectrometry:

1. It is based on ionization and fragmentation of sample molecules in the gaseous phase.
2. The instrument operates on the principle that moving ions may be deflected by electric and magnetic fields.

Which of the above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation:

Mass Spectrometry (MS):

It is an analytical technique used for determining the elemental composition of samples, quantifying the mass of particles and molecules, and elucidating their chemical structure.

MS is based on ionization and fragmentation of sample molecules in the gaseous phase.

The instruments used in this technique are called mass spectrometers and mass spectrographs, and they operate on the principle that moving ions may be deflected by electric and magnetic fields.

Clinical laboratories use the MS technology for disease screening, diagnosis of disease and metabolic disorders, monitoring of drug therapy, identifying drug toxicity and poisoning, and discovering new biomarkers.

Biomarker is short for biological marker, and is used as an indication that a biological process in the body has happened or is ongoing.

82. Which of the following country share border with both Black sea and Mediterranean Sea?

- A. Turkey
- B. Serbia
- C. Georgia
- D. Russia

Correct Answer: A.

Explanation: Self Explanatory- Map pointing.

83. Which of the following is not the disputed site between India & China?

- A. Doklam
- B. Galwan valley
- C. Depsang Plains
- D. Lipulekh pass

Correct Answer: D

Explanation: Lipulekh pass is located atop the Kalapani at a tri-junction between India, China and Nepal. The Indo-Nepal border dispute over Lipulekh dates back to 1997 when for the first time Nepal raise objections against the decision of India and China to open Lipulekh pass for travelling to Mansarovar.

84. Which satellite is dedicated as India's first multi wavelength space observatory?

- A. Astrosat
- B. SRMSAT
- C. SARAL
- D. Jugnu

Correct Answer: A

Explanation: Astrosat is India's first dedicated multi-wavelength space telescope. It was launched on a PSLV-XL on 28 September 2015. With the success of this satellite, ISRO has proposed launching AstroSat-2 as a successor for Astrosat.

85. Consider the following assertion and reason:

Assertion : Those places east of Greenwich will be ahead of Greenwich time and those to the west will be behind it.

Reason : The Earth rotates around its imaginary axis from east to west.

- A. Both the Assertion and the Reason are correct and the Reason is the correct explanation of the Assertion.
- B. The Assertion and the Reason are correct but the Reason is not the correct explanation of the Assertion.
- C. The Assertion is correct but the Reason is not correct.
- D. The Assertion is not correct but the Reason is correct.

Correct Answer: C

Explanation:

- To the left of the 0° longitude (the Prime Meridian) are the Western longitudes and to its right are eastern longitudes, whereas to the left of the 180° longitude (the International Date Line) are the eastern longitudes and to its right are the western longitudes.
- When we move towards the left of any longitude the time gets reduced by 4 minutes for every 1° of longitude whereas while moving towards the right of any longitude the time gets enhanced by 4 minutes for every 1° of longitude.
- We gain one day (24 hours) while crossing the International Date Line from its right and losing one day while crossing it from its left.

86. Appalachian mountain is located in.

- A. Western South America
- B. Eastern North America
- C. Western North America
- D. Eastern South America

Correct Answer: B

Explanation: Refer NCERT Class Notes.

87. Which of the following countries is not a part of Horn of Africa?

- A. Ethiopia
- B. Djibouti
- C. Egypt
- D. Eritrea

Correct Answer: C

Explanation: Horn of Africa, region of eastern Africa. It is the easternmost extension of African land and for the purposes of this article is defined as the region that is home to the countries of **Djibouti, Eritrea, Ethiopia,** and **Somalia**, whose cultures have been linked throughout their long history.

88. Which of the following is/are correctly matched?

1. Kris Gopalakrishnan Committee – Personal Data Protection Framework
2. BN Srikrishna committee – Non-Personal Data Governance Framework
3. J Satyanarayana Committee – National Digital Health Blueprint

Select the correct answer using the code given below:

- A. 1 and 2 only
- B. 2 and 3 only
- C. 3 only
- D. All of the above

Correct Answer: C

Explanation: Option 1 is incorrectly matched. Kris Gopalakrishnan Committee was formed in 2019 to recommend on the Non-Personal Data Governance Framework.

Option 2 is incorrectly matched. The Justice BN Srikrishna Committee was constituted by the Union government in July 2017, to deliberate on a data protection framework. The committee submitted its report in 2018 also proposed a draft Personal Data Protection Bill.

Option 3 is correctly matched. In July 2018, the NITI Aayog released a proposal document, National Health Stack (NHS). A committee was formed to create an implementation framework for NHS as National Digital Health Blueprint, chaired by former UIDAI Chairman J. Satyanarayana. The committee submitted its

report in

2019.

89. With reference to the Russia-India-China- RIC trilateral grouping, consider the following statements:

1. RIC as a strategic grouping first took shape in the late 1990s under the leadership of Yevgeny Primakov as “a counterbalance to the Western alliance”.
2. The group was founded for renewing old ties with India and fostering the newly discovered friendship with China.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation :

Recently, a special Russia-India-China- RIC trilateral Foreign Minister's Video Conference was organized to commemorate the 75th anniversary of the conclusion of the Second World War. RIC as a strategic grouping first took shape in the late 1990s under the leadership of Yevgeny Primakov as “a counterbalance to the Western alliance”. Primakov, a Russian politician and diplomat who was also the prime minister of Russia from 1998 to 1999, is credited with the idea for RIC. The group was founded for renewing old ties with India and fostering the newly discovered friendship with China. **Hence both statements are correct.**

90. Which among the following about atmosphere is correct ?

1. There is a distinct line of separation between atmosphere and outer space.
 2. Stratosphere is the lower most level of atmosphere
 3. Atmosphere merges with outer space imperceptibly.
 4. As we go up, pressure decreases.
- A. 1 & 4
 - B. 3 & 4
 - C. 1 2 & 4
 - D. 1,3 & 4

Correct Answer: B

Explanation: Refer NCERT Class notes.

91. Water Body that separates India and the Sri Lanka is

- A. Palk Strait
- B. 8 degree channel
- C. Great channel
- D. 10 degree channel

Correct Answer: A

Explanation: Palk Strait, inlet of the Bay of Bengal between southeastern India and northern Sri Lanka.

92. Israel has common border with

- A. Lebanon, Syria, Jordon and Egypt
- B. Lebanon, Syria, Turkey and Jordan

- C. Cyprus, Turkey, Jordan and
- D. Turkey, Syria, Iraq and Yemen

Correct Answer: A

Self Explanatory.

93. Recently a massive explosion had taken place in Beirut causing large scale destruction. The blast was heard 240 km away on the island of Cyprus in the eastern Mediterranean. Beirut is the capital city of which of the following countries?

- A. Iraq
- B. Lebanon
- C. Syria
- D. Palestine

Correct Answer: B

Explanation: Recently, a massive explosion took place in Beirut, capital of Lebanon, which left more than hundred people dead and more than 4,000 injured, according to the reports until now.

- The blasts were likely triggered by over **2,700 tonnes of ammonium nitrate** that had been **confiscated and stored** by authorities near the port for over six years.
- A **two-week state emergency** has been imposed in Beirut following the blast.

94. Consider the following statements regarding the Goods and Services Tax (Compensation to States) Act:

1. It provides for compensation to the States for the loss of revenue arising on account of a national calamity or due to implementation of the goods and services tax.
2. The Act assumes nominal growth rate of revenue subsumed for a State during the transition period as fourteen percent per annum.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: B

Explanation: Statement 1 is incorrect. The Goods and Services Tax (Compensation to States) Act is to provide for compensation to the States for the loss of revenue arising on account of implementation of the goods and services tax in pursuance of the provisions of the Constitution (One Hundred and First Amendment) Act, 2016.

Statement 2 is correct. As per the act the projected nominal growth rate of revenue subsumed for a State during the transition period shall be fourteen percent per annum.

The projected revenue for any year in a State is calculated by applying the projected growth rate over the base year revenue of that State.

For the purpose of calculating the compensation amount payable in any financial year during the transition period, the financial year ending 31st March, 2016, is taken as the base year.

95. Which of the following mountain pass(s) is/are in the Union Territory of Ladakh?

1. Rezang La
2. Nathu La

3. Khardung La

Select the correct answer using the code given below:

- A. 1 and 2 only
- B. 2 and 3 only
- C. 1 and 3 only
- D. All of the above

Correct Answer: C

Explanation: Option 1 is correct. **Rezang La** is a mountain pass on the south-eastern approach to **Chushul Valley** in the union territory of Ladakh. A major battle was fought between Indian and Chinese forces in 1962 at Rezang La.

Option 2 is incorrect. **Nathu La** is a mountain pass in the Himalayas in **East Sikkim** district. It connects the Indian state of Sikkim with China's Tibet Autonomous Region.

Option 3 is correct. **Khardung La** is a mountain pass in the **Leh district** of the union territory of Ladakh. The pass on the Ladakh Range is north of Leh and is the gateway to the Shyok and Nubra valleys.

96. Consider the following statements regarding the Purchasing Managers' Index (PMI):

- 1. It is a direct measure of the retail inflation prevalent in the economy.
- 2. A PMI reading under 50 represents a contraction, and a reading at 50 indicates no change in the economic condition.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: B

Explanation: Statement 1 is incorrect. The purchasing managers' index (PMI) is an economic indicator that surveys purchasing managers at businesses that make up a given sector. The most common PMI surveys are the manufacturing PMI and the services PMI.

The purchasing managers' index consists of several different surveys that are compiled into a single numerical result depending on one of several possible answers to each question.

The most common elements include: New orders, Factory output, Employment, Suppliers' delivery times, Stocks of purchases.

The most common answers include: Improvement, No change, Deterioration.

Statement 2 is correct. The headline PMI is a number from 0 to 100. A PMI above 50 represents an expansion when compared with the previous month. A PMI reading under 50 represents a contraction, and a reading at 50 indicates no change. The further away from 50 the greater the level of change.

97. Which of the following is/are the payloads in the AstroSat Mission?

- 1. Terrain Mapping Camera
- 2. Ultraviolet Imaging Telescope (UVIT)
- 3. Soft X-ray Telescope (SXT)

Select the correct answer using the code given below:

- 36 A. 1 and 2 only

- B. 2 and 3 only
- C. 1 and 3 only
- D. All of the above

Correct Answer: B

Explanation: AstroSat is the first dedicated Indian astronomy mission aimed at studying celestial sources in X-ray, optical and UV spectral bands simultaneously.

Option 1 is incorrect. Terrain Mapping Camera (TMC) was used onboard the Chandrayaan 1 mission and TMC 2 was onboard the Orbiter payloads of Chandrayaan 2.

Option 2 and 3 are correct. Five payloads of ASTROSAT are chosen to facilitate a deeper insight into the various astrophysical processes occurring in the various types of astronomical objects constituting our universe.

–The Ultraviolet Imaging Telescope (UVIT), capable of observing the sky in the Visible, Near Ultraviolet and Far Ultraviolet regions of the electromagnetic spectrum

–Large Area X-ray Proportional Counter (LAXPC), is designed for study the variations in the emission of X-rays from sources like X-ray binaries, Active Galactic Nuclei and other cosmic sources.

–Soft X-ray Telescope (SXT) is designed for studying how the X-ray spectrum of 0.3-8 keV range coming from distant celestial bodies varies with time.

–Cadmium Zinc Telluride Imager (CZTI), functioning in the X-ray region, extends the capability of the satellite to sense X-rays of high energy in 10-100 keV range.

–Scanning Sky Monitor (SSM), is intended to scan the sky for long term monitoring of bright X-ray sources in binary stars, and for the detection and location of sources that become bright in X-rays for a short duration of time.

98. Consider the following statements regarding the Prohibition of Child Marriage Act, 2006:

1. It defines child as a male who has not completed twenty-one years of age and a female who has not completed eighteen years of age.
2. It treats underage marriages as invalid and prohibits any recognition to such marriages.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: A

Explanation: Statement 1 is correct. The Prohibition of Child Marriage Act, 2006 defines “child” means a person who, if a male, has not completed twenty-one years of age, and if a female, has not completed eighteen years of age; “child marriage” means a marriage to which either of the contracting parties is a child.

Statement 2 is incorrect. It treats underage marriages as valid, but voidable. An underage marriage is valid as long as the minors involved in the marriage want it to remain valid.

The petition for such action may be filed at any time but before the child filing the petition completes two years of attaining majority.

The PCMA also treats those underage marriages as void or having no legal validity, where they involve trafficking, enticement, fraud and deceit.

99. Consider the following statements regarding the Group of Twenty or G20:

1. The G-20's primary mandate is to prevent future international financial crises and shape the global economic agenda.
2. India has proposed development of voluntary 'G-20 Principles on Coordinated Cross-Border Movement of People'.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: C

Explanation: Statement 1 is correct. The Group of Twenty, or G20, is the premier forum for international cooperation on the most important aspects of the international economic and financial agenda.

The objectives of the G20 are:

- Policy coordination between its members in order to achieve global economic stability, sustainable growth;
- To promote financial regulations that reduce risks and prevent future financial crises; and
- To create a new international financial architecture.

Statement 2 is correct. The G20 Foreign Ministers' Extraordinary Meeting was convened by the current G20 Chair, the Kingdom of Saudi Arabia on 3rd September, 2020.

India has proposed for the development of voluntary 'G-20 Principles on Coordinated Cross-Border Movement of People' with three elements: a) Standardisation of testing procedures and universal acceptability of test results; b) Standardisation of 'Quarantine procedures'; c) Standardisation of 'movement and transit' protocols.

The G20 comprises Argentina, Australia, Brazil, Canada, China, EU, France, Germany, India, Indonesia, Italy, Japan, Mexico, Russia, Saudi Arabia, South Africa, South Korea, Turkey, UK and USA.

100. Consider the following statements regarding BIMSTEC:

1. All members of the group share their border with the Indian Ocean.
2. BIMSTEC has a Permanent Secretariat in Dhaka, Bangladesh.

Which of the statements given above is/are correct?

- A. 1 only
- B. 2 only
- C. Both 1 and 2
- D. Neither 1 nor 2

Correct Answer: B

Explanation: The Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation (BIMSTEC) is a regional organization comprising seven Member States lying in the littoral and adjacent areas of the Bay of Bengal constituting a contiguous regional unity.

Statement 1 is incorrect. It constitutes seven Member States: five deriving from South Asia, including Bangladesh, Bhutan, India, Nepal, Sri Lanka, and two from Southeast Asia, including Myanmar and Thailand.

Bhutan and Nepal are land-locked countries.

Statement 2 is correct. After a span of 17 years of the founding of BIMSTEC, Permanent Secretariat was established in Dhaka, Bangladesh in 2014 to serve the BIMSTEC Member States.

