

## Practice Questions

- Which one of the following Committees was constituted to recommend the detailed methodology for identification of families living Below Poverty Line in urban areas ?
  - Hashim Committee
  - Naresh Chandra Committee
  - Sachar Committee
  - Bhure Lal Committee
- Which one of the following Amendment Acts of the Constitution of India omitted the Right to Property from the list of Fundamental Rights?
  - 44th Amendment Act
  - 42nd Amendment Act
  - 18th Amendment Act
  - 76th Amendment Act
- What is the procedure in the Lok Sabha according to Rule 50(3), about discussion during the time for questions under Rule 32 in respect of any question or of any answer given to a question?
  - No discussion
  - Partial discussion
  - Full discussion
  - Short notice discussion
- International Treaty on Plant Genetic Resources for Food and Agriculture was adopted by which one of the following organizations?
  - United Nations Development Programme (UNDP)
  - World Health Organization (WHO)
  - United Nations Food and Agriculture Organization (UNFAO)
  - International Labour Organization (ILO)
- National Bank for Financing Infrastructure and Development (NaBFID) is regulated and

supervised by which one of the following institutions?

- (a) National Housing Bank (NHB)
- (b) Reserve Bank of India (RBI)
- (c) National Bank for Agriculture and Rural Development (NABARD)
- (d) Securities and Exchange Board of India (SEBI)

6. Which one of the following is correct about Net Investment in an economy?

- (a) Net Investment = Gross investment - Depreciation
- (b) Net Investment = Gross investment - Inflation
- (c) Net Investment = Gross investment + Inflation - Depreciation
- (d) Net Investment = Gross investment + Depreciation

7. Imposing an Import quota helps in :

- 1. correcting unfavourable balance of payments.

- 2. improving balance of trade.
- 3. protecting domestic industries.

Which of the above statements are correct?

- (a) 1 and 2 only
- (b) 1 and 3 only
- (c) 2 and 3 only
- (d) 1, 2 and 3

8. An individual's actual standard of living can be assessed by:

- (a) Gross National Income
- (b) Net National Income
- (c) Per Capita Income
- (d) Disposable Personal Income

9. Which one of the following companies has launched a new Artificial Intelligence (AI) tool named Deep Research?

- (a) Microsoft
- (b) Meta
- (c) OpenAI

- (d) Amazon
10. The Grand Ethiopian Renaissance Dam (GERD) is built on which river?
- (a) Blue Nile River  
(b) Yangtze River  
(c) Congo River  
(d) Mekong River
11. Consider the following organizations regarding Forces falling under the intelligence and security organizations specified in the Second Schedule of the RTI Act, 2005:
1. Border Security Force
  2. Central Reserve Police Force
  3. Assam Rifles
- Which of the above organizations are correct?
- (a) 1 and 2 only  
(b) 2 and 3 only  
(c) 1 and 3 only  
(d) 1, 2 and 3
12. Placing the earliest first, arrange the following international events in the chronological order:
1. Introduction of www (World Wide Web)
  2. Advent of Inter-Continental Ballistic Missiles
  3. Launch of first communication satellite
- Select the answer using the code given below:
- (a) 2-1-3  
(b) 1-2-3  
(c) 3-2-1  
(d) 2-3-1
13. Consider the following statements regarding the Central Information Commission:
1. The Central Information Commission can require the public authority to publish certain information.

2. The Central Information Commission can require the public authority to compensate the complainant.
3. The Central Information Commission can reject the application.

Which of the above statements are correct?

- (a) 1 and 2 only
  - (b) 2 and 3 only
  - (c) 1 and 3 only
  - (d) 1,2 and 3
14. SVAMITVA Scheme was launched by which one of the following Ministries?
- (a) Ministry of Agriculture and Farmers Welfare
  - (b) Ministry of Panchayati Raj
  - (c) Ministry of Rural Development
  - (d) Ministry of Science and Technology

15. Which one of the following cities is the host of STREE Summit 2025 on women's safety and empowerment?

- (a) Hyderabad
- (b) Bhopal
- (c) Chennai
- (d) Bengaluru

16. Which one of the following statements about Ishwar Chandra Vidyasagar is NOT correct?

- (a) He was the Principal of Sanskrit College, Calcutta
- (b) He was a Government Inspector of Schools
- (c) He was a Secretary to the Bethune School
- (d) He was the founder of Widow Remarriage Association

17. Which of the following Articles of the Constitution of India provide(s) for the representation of the Anglo-Indian community in the Legislative Assemblies of the States?

1. Article 333
2. Article 331
3. Article 332
4. Article 330

Select the correct answer using the code given below:

- (a) 1, 2 and 3
  - (b) 1, 2 and 4
  - (c) 1 only
  - (d) 2 only
18. Which one of the following clauses of Article 22 of the Constitution of India makes it mandatory to give information about the grounds of arrest to the person arrested?
- (a) Clause 2
  - (b) Clause 4
  - (c) Clause 5
  - (d) Clause 1
19. Which Part of the Constitution of India is related to elections?

- (a) Part IX
- (b) Part XVI
- (c) Part XI
- (d) Part XV

20. Which one of the following radiations has longer wavelength?

- (a) X-rays
- (b) Ultraviolet
- (c) Micro Wave
- (d) Infra-red

21. Chola inscriptions mention several categories of lands. Which one of the following was meant for the maintenance of school ?

- (a) Tirunamattukkani
- (b) Shalabhoga
- (c) Vellanvagai
- (d) Pallichhandam

22. Consider the following statements regarding citizenship at the commencement of the Constitution of India:

1. Every person who has his domicile in the territory of India, shall not necessarily be a citizen of India.
2. Either of whose parents was born in the territory of India, shall be a citizen of India.
3. Who has been ordinarily a resident in the territory of India for not less than 7 years immediately preceding such commencement, shall be a citizen of India.

Which of the above statements are correct?

- (a) 1 and 2 only
  - (b) 2 and 3 only
  - (c) 1 and 3 only
  - (d) 1, 2 and 3
23. Which one of the following Articles of the Constitution of India provides that the State shall endeavour to protect and improve the

environment and to safeguard the forests and wild life of the country?

- (a) Article 49
- (b) Article 48
- (c) Article 48A
- (d) Article 49A

24. Arrange the following foreign travellers to India in chronological order, beginning with the earliest :

1. Peter Mundy
2. Antonio Monserrate
3. Afanasii Nikitich Nikitin
4. Ibn Battuta

Select the answer using the code given below:

- (a) 2-1-4-3
- (b) 2-3-4-1
- (c) 4-3-2-1
- (d) 3-4-1-2

25. Who among the following presided over the first session of All India

- Kisan Sabha in Lucknow in April 1936?
- (a) Sahajananda Saraswati  
(b) R. G. Ranga  
(c) Ram Manohar Lohia  
(d) Jayaprakash Narayan
26. According to Rules of Procedure and Conduct of Business in the Lok Sabha, before taking one's seat, every member of the house shall need to sign in the presence of:
- (a) the Speaker  
(b) the Deputy Speaker  
(c) the Secretary-General  
(d) the Vice President
27. Consider the following statements:  
Which of the following statements about the Home Rule League are correct ?
1. Lokamanya Tilak set up the Home Rule League at the Bombay Provincial Conference held at Belgaum in April 1916
2. Annie Besant announced the formation of Home Rule League in September 1916
3. To avoid friction, Tilak's League was to work in Maharashtra (excluding Bombay city), Karnataka, Central Provinces and Berar and Besant's League was given charge of the rest of India
- Select the answer using the code given below:
- (a) 1 and 2 only  
(b) 1 and 3 only  
(c) 2 and 3 only  
(d) 1, 2 and 3
28. Which one of the following salts is responsible for temporary hardness of water ?
- (a) Sulphates of calcium

- (b) Chlorides of magnesium  
(c) Bicarbonates of magnesium  
(d) Sulphates of magnesium
29. Under Rule 8(1) of Rules of Procedure and Conduct of Business in the Lok Sabha, who fixes the date for the election of Deputy Speaker?
- (a) Speaker  
(b) Secretary-General  
(c) Leader of opposition  
(d) Vice President
30. Ethereum, Tether, Solana and Cardano are all forms of
- (a) Crypto currency  
(b) Artificial Intelligence (AI) Startups  
(c) Humanoid Robots  
(d) Medical apps
31. Consider the following statements with reference to Feldspar mineral :

1. Half of the earth's crust is composed of feldspar
  2. It has light cream to salmon pink colour
  3. Magnesium is a common element in all types of feldspar
- Which of the statements given above is/are correct?
- (a) 1 only  
(b) 1 and 2 only  
(c) 2 and 3 only  
(d) 1, 2 and 3
32. Desh Ka Prakriti Parikshan Abhiyaan is an initiative of which one of the following Ministries ?
- (a) Ministry of Science and Technology  
(b) Ministry of AYUSH  
(c) Ministry of Health and Family Welfare  
(d) Ministry of Education

33. What is PPP in sustainable agricultural sector?

- (a) Public Product Percentage
- (b) Present Product Partnership
- (c) Public Private Partnership
- (d) Present Private Percentage

34. National Environmental Engineering Research Institute (NEERI) operates under which one of the following Ministries?

- (a) Ministry of Jal Shakti
- (b) Ministry of Environment, Forest and Climate Change
- (c) Ministry of Science and Technology
- (d) Ministry of Earth Sciences

35. Which one of the following is not the principle of India's Foreign Policy for Panchsheel ?

- (a) Mutual non-interference in each other's affairs
- (b) Mutual contentions

- (c) Equality and mutual benefit
- (d) Peaceful co-existence

36. Which of the following Articles of the Constitution of India authorise the Parliament to protect persons in the service of the Union or a State in respect of any action taken by them during martial law to maintain or restore order?

1. Article 33
2. Article 34
3. Article 35
4. Article 32

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) 2 and 4 only

37. Algal Bloom is, when unusually large concentrations of

- (a) Nutrients are present in water bodies; an excess growth of algae appears
- (b) Planktons are present in water bodies; an excess growth of algae appears
- (c) Bacteria are present in water bodies; an excess growth of algae appears
- (d) Oxygen is present in water bodies; an excess growth of algae appears

38. Consider the following pairs with reference to Thermal Power Plants and their location in respective states in India:

Thermal Power Plant	Located in State
Panki	Uttar Pradesh
Parli	Karnataka
Vijayawada	Telangana
Vanakbari	Gujarat

How many of the pairs given above is/are correctly matched?

- (a) 1
- (b) 2
- (c) 3
- (d) 4

39. The headquarters of World Meteorological Organization (WMO) is located at

- (a) Switzerland
- (b) Scotland
- (c) South Africa
- (d) Italy

40. #23for23 initiative recently seen in the news is related to:

- (a) conservation of snow leopards
- (b) mitigating marine plastic pollution
- (c) promoting renewable energy adoption
- (d) accelerating climate-action commitments

41. Consider the following statements about the Vedanta philosophy Consider the following statements with regard to National Technology Day:

1. It commemorates the momentous events of 11th May 1998, when India conducted successful nuclear tests under Operation Shakti
2. The official theme for National Technology Day 2025 is 'School to Startups - Igniting Young Minds to Innovate'

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

42. Match List I with List II and select the answer using the code given below  
 Lists:

	List I (Mineral)		List II (City)
1.	Manganese	A.	Bewar
2.	Mica	B.	Balaghat
3.	Iron-ore	C.	Bilaspur
4.	Bauxite	D.	Ballary

Select the answer using the code given below:

Code: A B C D

- (a) 3 1 4 2
- (b) 3 4 1 2
- (c) 2 1 4 3
- (d) 2 4 1 3

43. The amount of air breathed in and out during a normal respiration by human lungs is referred to as

- (a) Vital capacity

- (b) Tidal volume  
(c) Inspiratory volume  
(d) Total lung capacity
44. Microorganisms which can produce organic matter to some extent through oxidation of certain chemicals in the absence of sunlight are known as
- (a) Photo-autotrophs  
(b) Chemo-autotrophs  
(c) Micro-autotrophs  
(d) Oxi-autotrophs
45. Which one of the following Articles of the Constitution of India has the provision regarding appointment of acting Chief Justice of the Supreme Court of India?
- (a) Article 124  
(b) Article 126  
(c) Article 127  
(d) Article 128
46. The Speaker of the House may disallow any question, or a part thereof when in the opinion of the Speaker:
1. It is an abuse of the right of questioning.
  2. It is calculated to obstruct or prejudicially affect the procedure of the House.
  3. It is in contravention of these rules.
  4. It is the matter of public importance.
- Choose the correct option/s from the above:
- (a) 1 only  
(b) 1 and 2 only  
(c) 1, 2 and 3 only  
(d) 1, 2, 3 and 4
47. Which one of the following is the northernmost river basin of the Deccan Plateau ?
- (a) Chambal

- (b) Mahi  
(c) Narmada  
(d) Tapti
48. Nitrate when present in excess in drinking water causes
- (a) Fluorosis  
(b) Minamata  
(c) Blue baby syndrome  
(d) Itai-itai
49. Unless the Speaker otherwise directs, normally which hour of every sitting shall be available for the asking and answering of questions under Rule 32 of Rules of Procedure and Conduct of Business in the Lok Sabha?
- (a) One hour during any time of every sitting  
(b) The first hour of every sitting  
(c) The last hour of every sitting  
(d) The last two hours of every sitting
50. State of Assam shares borders with how many other countries and Indian states respectively?
- (a) 2 countries and 6 Indian states respectively  
(b) 2 countries and 7 Indian states respectively  
(c) 3 countries and 7 Indian states respectively  
(d) 3 countries and 6 Indian states respectively
51. Which of the following are the factors that cause variation in the amount of insolation on the Earth ?
1. Rotation of the earth on its axis
  2. Length of the day
  3. Distribution of land and water on the earth
- Select the answer using the code given below:
- (a) 1 only  
(b) 1 and 2 only  
(c) 2 and 3 only

- (d) 1, 2 and 3
52. How many notices under Rule 57 can a member give for any one sitting?
- (a) No Member shall give more than one such notice for any one sitting  
(b) No Member shall give more than two such notices for any one sitting  
(c) No Member shall give more than three such notices for any one sitting  
(d) No Member shall give more than four such notices for any one sitting
53. Each clause or Schedule or clause, or Schedule as amended, as the case may be, of a Bill seeking to amend the Constitution shall be put to the vote of the House separately and shall form part of the Bill if it is passed by a majority of the total membership of the House and by a majority of:
- (a) Not less than one-third of the members present and voting  
(b) Not less than two-thirds of the members present and voting  
(c) Not less than fifty percent of the members present and voting  
(d) Not less than forty percent of the members present and voting
54. Which one among the following volcanic island chains is NOT associated with mid-oceanic ridge?
- (a) Azores Islands  
(b) Ascension Islands  
(c) Hawaiian Islands  
(d) Tristan da Cunha
55. Which one of the following Ministries has launched the 'Safai Apnao, Bimaari Bhagao (SABB) campaign from 1st to 31st July, 2025?
- (a) Ministry of Home Affairs  
(b) Ministry of Rural Development  
(c) Ministry of Housing and Urban Affairs  
(d) Ministry of Panchayati Raj

56. Which of the following features regarding 'Shram Suvidha Portal' are correct?

1. Unique labour identification number (LIN) will be allotted to units to facilitate online registration
2. Mandatory uploading of inspection reports within 72 hours by labour inspectors
3. Timely redressal of grievances will be ensured with the help of the portal

- (a) 1, 2 and 3  
 (b) 1 and 2 only  
 (c) 1 and 3 only  
 (d) 2 and 3 only

57. Consider the following pairs with reference to sedimentary rocks and the process of their formation:

Sedimentary Rock	Process of Formation
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Chert	Chemically formed
Geyselite	Organically formed
Shale	Mechanically formed

Which of the pairs given above is/are correctly matched?

- (a) 1 only  
 (b) 1 and 2 only  
 (c) 2 and 3 only  
 (d) 1, 2 and 3

58. Which of the following arguments advanced in favour of labour-intensive techniques?

1. In underdeveloped countries there is an acute shortage of capital and entrepreneurial resources
2. There is considerable saving in foreign exchange
3. These techniques quickly increase the supply of

- consumable goods and obviate the danger of inflation
4. More employment will be offered to the labour force in the long run
- (a) 1, 2 and 4 only  
(b) 1, 3 and 4 only  
(c) 1, 2 and 3 only  
(d) 2, 3 and 4 only
59. Which one of the following Yojanas replaces two schemes - National Agricultural Insurance Scheme (NAIS), 1999 as well as the Modified National Agricultural Insurance Scheme (MNAIS), 2010 - by incorporating the best features of all these schemes while removing the previous shortcomings and weaknesses ?
- (a) Pradhan Mantri Krishi Sinchayee Yojana  
(b) Pradhan Mantri Fasal Sinchayee Yojana  
(c) Pradhan Mantri Krishi Bharat Yojana  
(d) Pradhan Mantri Fasal Bima Yojana
60. Which one of the following is correct with respect to the Industrial Relations Bill?
- (a) Workers can raise objection to retrenchment within five years  
(b) Government consent required for workers to move courts in case conciliation fails  
(c) Trade union deemed registered if application not processed within six months by government  
(d) Labour court, board of arbitration and tribunal court won't exist; only industrial tribunal to continue
61. Which one among the following mahajanapadas in ancient India was an oligarchy ?
- (a) Vajji  
(b) Kosala

- (c) Gandhara
- (d) Magadha

62. Consider the following statements regarding Deepfakes:

1. They are created by machine learning models of Artificial Intelligence, which use neural networks to manipulate images and videos.
2. India has a specific law exclusively criminalising deepfakes.

Which of the statement(s) given above is/are correct?

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

63. Which one of the following sculptures found at Sanchi Stupa is

NOT directly inspired by Buddhist ideas ?

- (a) Empty seat
- (b) Shalbhanjika
- (c) Tree
- (d) Wheel

64.

The Constitution (Seventy-third Amendment) Act provides for

- (a) an elaborate system of establishing municipal self-government
- (b) an elaborate system of establishing panchayats as units of self-government
- (c) establishing a Commission for Linguistic Minorities
- (d) the creation of the Jharkhand State

65. BHARATPOL portal has been developed by

- (a) The Election Commission of India

- (b) The Central Bureau of Investigation
- (c) The Enforcement Directorate
- (d) The Securities and Exchange Board of India
66. At which one among the following places did the British East India Company found its factory in the year 1611?
- (a) Madras
- (b) Masulipatam
- (c) Bombay
- (d) Balasore
67. Stratospheric Aerosol Injection (SAI), a proposed climate engineering technique, involves the use of which of the following substances?
- (a) Silver iodide and potassium iodide
- (b) Silver iodide and titanium dioxide
- (c) Sulphur dioxide and potassium iodide
- (d) Sulphur dioxide and titanium dioxide
68. Consider the following statements in the context of the Global Innovation Index (GII):
1. It is published annually by the WIPO.
  2. Switzerland has been ranked first in GII 2025.
  3. India's patent-to-GDP ratio has remained stagnant, indicating the poor economic impact of patent activity.
- How many of the statement(s) given above is/are correct?
- (a) 1 only
- (b) 2 and 3 only
- (c) 1, 2 and 3
- (d) 1 and 2 only
69. Which among the following Acts provided for the establishment of a Supreme Court of Justice at Calcutta

for Europeans, their employees and the citizens of India ?

- (a) The Regulating Act of 1773
- (b) The Charter Act of 1793
- (c) The Charter Act of 1813
- (d) Government of India Act of 1858

70. Who, among the following, has introduced a resolution in 1882 which is also called the Magna Carta of Local Self-Government in India ?

- (a) Lord Macaulay
- (b) Lord Canning
- (c) Lord Ripon
- (d) Lord William Bentinck

71. Consider the following countries:

1. Argentina
2. Brazil
3. Paraguay
4. Uruguay
5. Chile
6. French Guyana

How many of the above countries are Full members of the MERCOSUR (Southern Common Market) bloc?

- (a) Only three
- (b) Only four
- (c) Only five
- (d) All six

72. Consider the following statements about Volatile Organic Compounds (VOC):

1. All VOCs are anthropogenic and do not occur naturally.
2. They can cause photochemical smog.

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

73. Which one of the following terms is associated with the practice of Sufism?

- (a) Jizya
- (b) Ijma
- (c) Muqaddam
- (d) Murid

74. Consider the following features:

1. Consent of the governed
2. Political equality
3. Accountability of the ruled to the ruler

Which of the above feature/features outline democratic rule?

- (a) 1 and 2 only
- (b) 2 and 3 only
- (c) 1, 2 and 3
- (d) 3 only

75.

The Global Plastic Action Partnership (GPAP), is an initiative of which of the following?

(a) United Nations Environment Programme

(b) World Bank

(c) World Economic Forum

(d) Organisation for Economic Co-operation and Development

76. Placing the earliest first, arrange the following countries in the chronological order in which they granted universal adult franchise:

1. USA
2. Sri Lanka
3. Japan
4. India

(a) 1, 2, 3, 4

(b) 2, 3, 4, 1

(c) 1, 3, 4, 2

(d) 3, 4, 1, 2

77. Which one of the following statements is correct?

(a) A neutron is formed by combination of an electron and a proton. Therefore, it is neutral

(b) The mass of an electron is about 1/2000 times that of a proton

(c) An isotope of cobalt is used in the treatment of goiter

(d) J. Thomson proposed that the nucleus of an atom contains only neutrons

78. Consider the following statements regarding microplastics:

1. Microplastics are defined as any fragment of plastic that is below 5 millimetres in size.
2. Along with water and soil, microplastics is also found in the atmosphere.

Which of the statements given above are correct?

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

79. Consider the following statements:

1. Steel smelting plants are major sources of particulate matter, carbon monoxide and sulphur dioxide.
2. Copper smelting plants are significant sources of sulphur dioxide and heavy metals such as arsenic and lead.

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

80. Which one of the following oxides is a neutral oxide?

- (a) CO
- (b) CO<sub>2</sub>
- (c) Na<sub>2</sub>O
- (d) MgO

81. Which of the following is/are cold ocean current/currents?

1. Alaska Current
2. North Atlantic Drift
3. West Wind Drift

Select the answer using the code given below:

- (a) 1 only
- (b) 1 and 2
- (c) 2 and 3
- (d) 3 only

82.

With regard to sound waves, which one among the following is correct?

- (a) Sound waves are transverse waves.
- (b) Sound waves follow the same law of reflection as followed by light waves.
- (c) Sound waves travel faster in a less dense medium.
- (d) Sound waves can travel in vacuum as well as in atmosphere.

83. While in search of iron ore deposits, Charles Weld, an American geologist

and Dorabji Tata were travelling in present-day Chhattisgarh in 1904 with a view to build a big Iron and Steel industry in India. In this course, they came in contact with tribal people carrying basket loads of iron ore, who helped them in the discovery of a source of iron. Identify the particular tribe from below:

- (a) Kharwars
- (b) Mundas
- (c) Santhals
- (d) Agarias

84. Which of the following statements with reference to Coriolis force is/are correct ?

1. Coriolis force acts perpendicular to the pressure gradient force
2. At the equator, the Coriolis force is zero and the wind blows perpendicular to the isobars

Select the answer using the code given below:

- (a) 1 only  
(b) 2 only  
(c) Both 1 and 2  
(d) Neither 1 nor 2
85. The lactic acid that gets accumulated in the muscle cells during rigorous exercise causing muscle cramps is produced from
- (a) ATP  
(b) Pyruvate  
(c) Ethanol  
(d) Glucose
86. Which one among the following is not an example of homologous organs?
- (a) Thorn of Bougainvillea and Tendril of Cucurbita  
(b) Wings of birds and Wings of butterflies  
(c) Forelimbs of horse and Hands of humans  
(d) Wings of bats and Flippers of dolphins
87. Which one of the following latitudes will experience a minimum angle of the Sun's rays when it is Summer Solstice in the Northern Hemisphere ?
- (a) Arctic Circle  
(b) Equator  
(c) Tropic of Cancer  
(d) Tropic of Capricorn
88. Mahendragiri, the highest peak of the Eastern Ghats, is located in which one of the following states?
- (a) Andhra Pradesh  
(b) Odisha  
(c) Telangana  
(d) Tamil Nadu
89. Which of the following statements about Periodic Labour Force Survey (PLFS) is/are correct ?

1. PLFS was launched by the National Statistical Office in 2017.
2. Its objective is to estimate the key employment and unemployment indicators in the short time interval of three months for the urban areas only in the Current Weekly Status (CWS).

Select the answer using the code given below:

- (a) 1 only
  - (b) 2 only
  - (c) Both 1 and 2
  - (d) Neither 1 nor 2
90. Which one of the following statements about the noble gases is not correct?
- (a) All of them have stable octet configuration.
  - (b) They are monoatomic.
  - (c) They are colourless.
  - (d) Xenon is found to be reactive.

91. With reference to the agricultural knowledge of the Harappans, consider the following statements:

1. There is evidence of ploughed fields at Kalibangan and at Shortughai and also of terracotta models of plough at Banawali and Jawaiwala.

2. There is ample evidence of advanced harvesting tools.

3. Wheat was not known to Harappans.

How many of the statements given above is/are correct ?

- (a) One
- (b) Two
- (c) Three
- (d) None

92. Which of the following is the correct ascending order of the given minerals in terms of their presence in the Earth's crust?

1. Amphibolite
2. Mica

3. Pyroxene  
Select the answer using the code given below:
- (a) 2, 3, 1
  - (b) 1, 2, 3
  - (c) 2, 1, 3
  - (d) 1, 3, 2
93. Ex-situ conservation of biodiversity consists of:
- (a) Sacred Groves
  - (b) National Parks
  - (c) Wildlife Sanctuaries
  - (d) Zoological Parks and Botanical Parks
94. Humid Subtropical Climate is NOT experienced in which one among the following regions?
- (a) Coastal South Africa
  - (b) East coast of Australia
  - (c) South Japan
  - (d) South Argentina
95. Which of the following statements about Mission LiFE (Lifestyle for Environment) is/are correct?
- 1. It envisions to promote consumerism.
  - 2. It plans to create and nurture a global network of individuals, namely 'Pro-Planet People'.
- Select the answer using the code given below:
- (a) 1 only
  - (b) 2 only
  - (c) Both 1 and 2
  - (d) Neither 1 nor 2
96. India has signed Which of the following statements about National Mission on Sustainable Habitat (NMSH) is/are correct?
- 1. It aims at promoting low-carbon urban growth towards reducing GHG emission intensity for achieving India's Nationally Determined Contribution (NDC).

2. It aims to reduce the Emissions Intensity of its GDP by 33 - 35% by 2035 from 2005 levels.

Select the answer using the code given below:

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

97. Which one of the following statements regarding oxidation and reduction reactions is NOT correct?

- (a) If a substance loses hydrogen during reaction, it is reduced
- (b) If a substance loses oxygen during reaction, it is reduced
- (c) If a substance gains hydrogen during reaction, it is reduced
- (d) If a substance gains oxygen during reaction, it is oxidized

98.

Which of the following statements with reference to Sleet is/are correct?

- 1. Sleet is frozen raindrops and refrozen melted snow-water.
- 2. It occurs when a layer of air with the temperature below freezing point overlies a warm layer near the ground surface,

Select the answer using the code given below:

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

99. Guru Arjan Dev compiled "Gurbani" in which one of the following texts?

- (a) Guru Granth Sahib
- (b) Adi Granth Sahib
- (c) Shabad
- (d) Nam-Kirtan

100.

Who among the following produced the first film in India in the year 1913?

- (a) Dhundiraj Govind Phalke
- (b) Ardeshir Irani
- (c) N.T. Rama Rao
- (d) Dwarkadas Sampat

101. With reference to the use of betel leaves and areca nuts, consider the following statements:

1. There is no reference to betel leaf in Charak Samhita and Sushruta Samhita.
2. Kalidasa's Raghuvamsha associates the practice of betel leaf chewing with South India.
3. Pattupattu mentions fields of areca plants.

Which of the statements given above are correct?

- (a) 1 and 2 only
- (b) 1 and 3 only

(c) 2 and 3 only

(d) 1, 2 and 3

102. Match List I with List II and select the answer using the code given below the Lists:

<b>List I (Type of Land in Chola Inscription)</b>	<b>List II (Purpose)</b>
Shalabhoga	Land gifted to temples
Pallichchhandam	Land donated to Jain Institutions
Vellanvagai	Land for the maintenance of a school
Tirunamattukkani	Land of non Brahmana peasant proprietors

Code:

A B C D

- (a) 1 4 2 3
- (b) 1 2 4 3
- (c) 3 2 4 1
- (d) 3 4 2 1

103.

Temperate forests of South India, known as 'Sholas' are found in which of the following hills?

1. Anaimalai
2. Nilgiris
3. Palani

Select the answer using the code given below:

- (a) 1 only
- (b) 1 and 2 only
- (c) 2 and 3 only
- (d) 1, 2 and 3

104.

Which one among the following is NOT a major oil field located in Gujarat?

- (a) Ankaleshwar
- (b) Kosamba
- (c) Mehsana
- (d) Moran

105. As per the Land Revenue Records, any land is categorized as Culturable Waste-Land if it is left fallow (uncultivated) for more than

- (a) 2 years
- (b) 3 years
- (c) 4 years
- (d) 5 years

106. Consider the following statement  
Consider the following statements regarding Lakshadweep:

1. Lakshadweep, the smallest Union Territory of India is an archipelago consisting of coral islands and reefs.
2. Lakshadweep consists of 36 islands in all, of which only 6 are inhabited.
3. The main occupation of the inhabitants

are fishing, coconut cultivation and coir twisting.

4. Lakshadweep coconut is branded as an organic product.

Which of the statements given above are correct?

- (a) 1, 2 and 3
- (b) 2, 3 and 4
- (c) 1, 3 and 4
- (d) 1, 2 and 4

107.

Consider the following statements with regard to a steel plant:

- I. It was setup in 1964 with Russian collaboration
- II. It receives iron ore from the Rourkela region
- III. Water and Hydel power is supplied by the Damodar Valley Corporation

Identify the Steel Plant on the basis of the above facts:

- (a) Bhilai Steel Plant
- (b) Bokaro Steel Plant
- (c) Rourkela Steel Plant
- (d) Durgapur Steel Plant

108.

An offshore terminal at Vadinar has been developed to reduce pressure from which of the following major ports in India?

- (a) Kandla Port
- (b) Cochin Port
- (c) Mormugao Port
- (d) New Mangalore Port

109. Which one among the following is NOT included in the National Food Security Mission Commercial Crops (NFSM-CC)?

- (a) Cotton
- (b) Coffee
- (c) Jute
- (d) Sugar cane

110.

In which one of the following types of forests of India can one find the Tussocky Grass?

(a) Tropical Deciduous Forests

(b) Tropical Thorn Forests

(c) Montane Forests

(d) Littoral Forests

## Keys and Answers

Sl.no	Ans	
1.	A	<p>Ans: 1 - (a)</p> <ul style="list-style-type: none"> <li>• <b>The Hashim Committee</b> (officially the Expert Group to Recommend the Detailed Methodology for Identification of Families Living Below Poverty Line in Urban Areas) was constituted in <b>2010</b> by the Planning Commission of India. It was chaired by S.R. Hashim.</li> </ul> <p>The committee recommended a three-fold classification for identifying the urban poor:</p> <ul style="list-style-type: none"> <li>• <b>Residential Vulnerability:</b> Families living in informal settlements or without a roof.</li> <li>• <b>Occupational Vulnerability:</b> Families whose livelihood is based on insecure, low-income, or hazardous jobs (e.g., ragpickers, construction workers).</li> <li>• <b>Social Vulnerability:</b> Households headed by women, children, or elderly persons with no support.</li> <li>• The findings of this committee were later used to design the urban component of the Socio-Economic and Caste Census (SECC) 2011.</li> </ul>
2.	A	<p>Ans: 2 - (a)</p> <ul style="list-style-type: none"> <li>• The 44th Amendment Act of 1978 removed the Right to Property from the list of Fundamental Rights in India. Before this amendment, the right was</li> </ul>

		<p>guaranteed under Article 19(1)(f) and Article 31. It was reclassified as a legal right (constitutional right) under Article 300A in Part XII of the Constitution.</p> <ul style="list-style-type: none"> <li>• <b>Purpose:</b> The amendment was introduced by the Janata Party government to ensure that the Right to Property did not hinder land reforms and social justice initiatives.</li> <li>• <b>Current Status:</b> It is now an ordinary legal right, meaning a person cannot approach the Supreme Court directly under Article 32 for its violation; they must instead approach High Courts under Article 226.</li> <li>• <b>Article 300A:</b> This article specifies that "no person shall be deprived of his property save by authority of law".</li> </ul>
3.	A	<p><b>Sol: 3 - (a)</b></p> <ul style="list-style-type: none"> <li>• According to Rule 50(3) of the Rules of Procedure and Conduct of Business in Lok Sabha, there shall be no discussion during the time allotted for questions (under Rule 32) in respect of any question or of any answer given to a question.</li> <li>• While the rule prohibits formal discussion, it does allow for supplementary questions for the purpose of further elucidating any matter of fact, provided that the Speaker may disallow any such question if, in their opinion, it infringes on the rules regarding questions.</li> </ul>
4.	C	<p><b>Ans 4 - (c)</b></p>

		<ul style="list-style-type: none"> <li>• The correct option is (c) United Nations Food and Agriculture Organization (FAO).</li> <li>• The International Treaty on Plant Genetic Resources for Food and Agriculture (ITPGRFA), also known as the "Seed Treaty" or "Plant Treaty," was adopted on November 3, 2001, during the 31st Session of the Conference of the Food and Agriculture Organization (FAO) of the United Nations. It entered into force on June 29, 2004, as a legally binding agreement aimed at guaranteeing food security through the conservation and sustainable use of plant genetic resources.</li> </ul>
5.	<b>B</b>	<p><b>Ans: 5 - (b)</b></p> <ul style="list-style-type: none"> <li>• The National Bank for Financing Infrastructure and Development (NaBFID) is regulated and supervised by the (b) Reserve Bank of India (RBI). It is regulated as an All India Financial Institution (AIFI) under sections 45L and 45N of the RBI Act, 1934.</li> <li>• Regulator: RBI</li> <li>• Establishment: National Bank for Financing Infrastructure and Development Act, 2021</li> <li>• Role: Development Finance Institution (DFI) for infrastructure financing</li> </ul>
6.	<b>A</b>	<p><b>Ans: 6 - (a)</b></p> <ul style="list-style-type: none"> <li>• Net investment represents the actual addition to an economy's capital stock during a specific period. It is calculated by taking Gross Investment (the total expenditure on all new capital goods) and subtracting Depreciation (the loss in value of existing assets due to wear and tear, age, or obsolescence).</li> </ul>

		<ul style="list-style-type: none"> <li>• <b>Gross Investment:</b> Total spending on new assets (e.g., machinery, buildings) without accounting for the deterioration of old ones.</li> <li>• <b>Depreciation:</b> Also known as capital consumption, this is the cost of maintaining the current capital stock.</li> <li>• <b>Significance:</b> If net investment is positive, the economy's productive capacity is growing; if it is zero, the economy is merely maintaining its current state.</li> </ul> <p>The correct option is (a) Net Investment = Gross investment - Depreciation.</p>
7.	D	<p>Ans: 7 - (d)</p> <p>Imposing an import quota is a trade restriction that sets a physical limit on the quantity of a specific good that can be imported over a set period. This action impacts the economy in the following ways:</p> <ul style="list-style-type: none"> <li>• <b>Correcting Unfavourable Balance of Payments (BoP):</b> By limiting the volume of imports, a country reduces its total expenditure of foreign exchange. This helps manage a BoP deficit by lowering the outflow of money to the rest of the world.</li> <li>• <b>Improving Balance of Trade (BoT):</b> The BoT is the difference between the value of a country's exports and imports of goods. Restricting the quantity of imports directly reduces the total value of imported goods, thereby narrowing a trade deficit or increasing a trade surplus.</li> <li>• <b>Protecting Domestic Industries:</b> Quotas limit competition from foreign producers who may offer cheaper goods. By reducing the supply of foreign</li> </ul>

		alternatives, the domestic market is "hedged," allowing local producers to capture more market share and thrive without excessive competition.
8.	C	<p>Ans: 8 - (c) Per Capita Income</p> <ul style="list-style-type: none"> <li>An individual's actual standard of living is best assessed by Per Capita Income. It is the most widely accepted indicator because it represents the average income earned per person in a nation. By dividing the total national income by the total population, it provides a measure of the material welfare and average purchasing power available to individuals.</li> </ul>
9.	C	<p>Ans: 9 - (c) OpenAI</p> <ul style="list-style-type: none"> <li>OpenAI officially launched Deep Research on February 2, 2025. This tool is an AI agent integrated into ChatGPT that autonomously performs multi-step research by scouring hundreds of online sources, including text, images, and PDFs. It is designed to complete complex, hours-long research tasks in roughly 5 to 30 minutes, providing a comprehensive report with citations. The tool is powered by a specialized version of OpenAI's o3 reasoning model optimized for web browsing and data analysis.</li> </ul>
10.	A	<p>Ans: 10 - (a) Blue Nile River</p> <ul style="list-style-type: none"> <li>The Grand Ethiopian Renaissance Dam (GERD) is a major gravity dam constructed on the Blue Nile River in the Benishangul-Gumuz region of <b>Ethiopia</b>, approximately 15–40 km east of the border with Sudan. The Blue Nile is a primary tributary of the <b>Nile River</b>, originating from <i>Lake Tana in</i></li> </ul>

		<p><i>Ethiopia</i> and contributing approximately 85% of the water that eventually flows into the main Nile.</p>
<b>11.</b>	<b>D</b>	<p>Ans: 11 - (d)</p> <ul style="list-style-type: none"> <li>• Under Section 24 of the Right to Information (RTI) Act, 2005, certain intelligence and security organizations established by the Central Government are exempted from the purview of the Act. These organizations are specifically listed in the Second Schedule of the Act.</li> <li>• Border Security Force (BSF): Explicitly listed in the Second Schedule.</li> <li>• Central Reserve Police Force (CRPF): Explicitly listed in the Second Schedule.</li> <li>• Assam Rifles: Explicitly listed in the Second Schedule.</li> <li>• These organizations are not required to furnish information except in cases relating to allegations of corruption or human rights violations.</li> </ul>
<b>12.</b>	<b>D</b>	<p>Ans: 12 - (d)</p> <p>The correct chronological order, starting with the earliest event, is 2-3-1.</p> <p>The timeline for these international events is as follows:</p> <ul style="list-style-type: none"> <li>• Advent of Inter-Continental Ballistic Missiles (1957): The world's first operational ICBM was the Soviet Union's R-7 Semyorka, which was successfully tested on August 21, 1957.</li> <li>• Launch of first communication satellite (1958/1962): While the first experimental communications satellite, SCORE, was launched by the U.S. in</li> </ul>

		<p>December 1958, the first active commercial communication satellite, Telstar 1, was launched on July 10, 1962. Both dates follow the advent of ICBMs.</p> <ul style="list-style-type: none"> <li>• Introduction of www (World Wide Web) (1989-1991): Tim Berners-Lee invented the World Wide Web in 1989 while working at CERN. It was introduced to the public in 1991.</li> </ul>
13.	D	<p>Ans: 13 - (d) 1, 2 and 3</p> <ul style="list-style-type: none"> <li>• All three statements accurately describe the powers of the Central Information Commission (CIC) as mandated under Section 19(8) of the Right to Information (RTI) Act, 2005:</li> <li>• <b>Statement 1 is correct:</b> The Commission has the power to require a public authority to take steps to secure compliance, which specifically includes publishing certain information or categories of information.</li> <li>• <b>Statement 2 is correct:</b> The CIC can require a public authority to compensate the complainant for any loss or other detriment suffered due to the failure of the authority to provide information.</li> <li>• <b>Statement 3 is correct:</b> During the adjudication of a second appeal or complaint, the Commission has the explicit authority to reject the application if it finds the request lacks merit or falls under exempted categories.</li> </ul>
14.	B	<p>Ans: 14 - (b) Ministry of Panchayati Raj</p> <ul style="list-style-type: none"> <li>• The SVAMITVA (Survey of Villages Abadi and Mapping with Improved Technology in Village Areas) scheme is a <b>Central Sector Scheme</b> of the</li> </ul>

		<p>Ministry of Panchayati Raj. It was launched by the Prime Minister on April 24, 2020, to commemorate National Panchayati Raj Day. The scheme aims to provide an integrated property validation solution for rural India by using drone technology to map inhabited land parcels and issue legal "Property Cards" to village household owners.</p>
15.	A	<p>Ans: 15 - (a)</p> <ul style="list-style-type: none"> <li>• The STREE Summit 2025 (specifically the second edition, STREE Summit 2.0) was hosted in Hyderabad on April 15, 2025. The event was organized by the Hyderabad City Security Council (HCSC) in collaboration with the Hyderabad City Police.</li> <li>• Theme: The theme of the summit was "<b>Accelerate Action for Women Empowerment</b>".</li> <li>• Focus: It focused on critical issues such as women's safety, workplace security, digital empowerment, and promoting a culture of respect and equality.</li> <li>• Key Figures: The summit featured prominent speakers including Telangana Deputy CM Mallu Bhatti Vikramarka and Hyderabad Police Commissioner C.V. Anand.</li> </ul>
16.	C	<p>Ans: 16 - (c)</p> <ul style="list-style-type: none"> <li>• Ishwar Chandra Vidyasagar was deeply involved with the Bethune School (later known as Bethune College), a pioneering institution for women's education. He played a crucial administrative role, often serving in honorary</li> </ul>

		<p>capacities, including as an honorary secretary, contributing significantly to its establishment and functioning.</p> <ul style="list-style-type: none"> <li>Ishwar Chandra Vidyasagar held significant positions like Principal of Sanskrit College and Government Inspector of Schools, and was actively involved with Bethune School. However, the claim that he founded a specific "Widow Remarriage Association" is not historically accurate, although he was the driving force behind the legal allowance and social acceptance of widow remarriages.</li> <li>Therefore, the statement that is NOT correct about Ishwar Chandra Vidyasagar is that he was the founder of the Widow Remarriage Association.</li> </ul>
17.	C	<p>Ans: 17 - (c)</p> <ul style="list-style-type: none"> <li>Article 333 of the Constitution of India provides for the representation of the Anglo-Indian community in the Legislative Assemblies of the States. Under this article, if the Governor of a state believed that the community was not adequately represented, they had the power to nominate one member to the Assembly.</li> </ul>
18.	D	<p>Ans: 18 - (d)</p> <p>Protection against arrest and detention in certain cases</p> <ul style="list-style-type: none"> <li>(1) No person who is arrested shall be detained in custody without being informed, as soon as may be, of the grounds for such arrest nor shall he be denied the right to consult, and to be defended by, a legal practitioner of his choice.</li> </ul>

- (2) Every person who is arrested and detained in custody shall be produced before the nearest magistrate within a period of twenty-four hours of such arrest excluding the time necessary for the journey from the place of arrest to the court of the magistrate and no such person shall be detained in custody beyond the said period without the authority of a magistrate.

(3) Nothing in clauses (1) and (2) shall apply—

- (a) to any person who for the time being is an enemy alien; or
- (b) to any person who is arrested or detained under any law providing for preventive detention.

(4) No law providing for preventive detention shall authorise the detention of a person for a longer period than three months unless—

- (a) an Advisory Board consisting of persons who are, or have been, or are qualified to be appointed as, Judges of a High Court has reported before the expiration of the said period of three months that there is in its opinion sufficient cause for such detention:
- Provided that nothing in this sub-clause shall authorise the detention of any person beyond the maximum period prescribed by any law made by Parliament under sub-clause (b) of clause (7); or
- (b) such person is detained in accordance with the provisions of any law made by Parliament under sub-clauses (a) and (b) of clause (7).

(5) When any person is detained in pursuance of an order made under any law providing for preventive detention, the authority making the order shall, as soon as may be, communicate to such person the grounds on which the

		<p>order has been made and shall afford him the earliest opportunity of making a representation against the order.</p> <ul style="list-style-type: none"> <li>(6) Nothing in clause (5) shall require the authority making any such order as is referred to in that clause to disclose facts which such authority considers to be against the public interest to disclose.</li> </ul> <p>(7) Parliament may by law prescribe—</p> <ul style="list-style-type: none"> <li>(a) the circumstances under which, and the class or classes of cases in which, a person may be detained for a period longer than three months under any law providing for preventive detention without obtaining the opinion of an Advisory Board in accordance with the provisions of sub-clause (a) of clause (4);</li> <li>(b) the maximum period for which any person may in any class or classes of cases be detained under any law providing for preventive detention; and</li> <li>(c) the procedure to be followed by an Advisory Board in an inquiry under sub-clause (a) of clause (4).</li> </ul>
<b>19.</b>	<b>D</b>	Ans: 19 - (d) Part XV
<b>20.</b>	<b>C</b>	<p>Ans : 20 - (c)</p> <ul style="list-style-type: none"> <li>The electromagnetic spectrum is arranged based on wavelength and frequency. Wavelength is inversely proportional to frequency and energy. Among the given options, the order of radiation from shortest to longest wavelength is:</li> <li>X-rays: ~0.01 nm to 10 nm.</li> </ul>

		<ul style="list-style-type: none"><li>• Ultraviolet: ~10 nm to 400 nm.</li><li>• Infra-red: ~700 nm to 1 mm.</li><li>• Micro Wave: ~1 mm to 1 m.</li></ul>
<b>21.</b>	<b>B</b>	<p><b>Ans: 21 - (b)</b></p> <ul style="list-style-type: none"><li>• The Chola empire, a prominent South Indian dynasty, left behind a rich legacy of inscriptions. These historical records offer invaluable details about their governance, societal structure, and economic practices, including the classification and allocation of land.</li><li>• Understanding these land categories helps us comprehend how the Chola administration supported various aspects of public life, such as education and religious activities.</li></ul> <p><b>Analyzing Land Terms in Chola Inscriptions</b></p> <p>Chola inscriptions detail several types of land endowments, each designated for specific purposes.</p> <p>Let's look at the options provided:</p> <ul style="list-style-type: none"><li>• Tirunamattukkani: This category typically referred to lands associated with temples, often gifted for the upkeep and service of the deity and the temple complex.</li><li>• Shalabhoga: This land classification was specifically allocated for the maintenance of schools. The term "Shala" itself relates to a place of learning or a school, clearly indicating its educational function.</li></ul>

		<ul style="list-style-type: none"> <li>• Vellanvagai: This term generally denotes land owned and cultivated by peasant proprietors, often belonging to the Vellalar community. This land was primarily used for agriculture and contributed revenue to the state.</li> <li>• Pallichhandam: This referred to grants of land made to Jaina or Buddhist religious institutions, such as monasteries (viharas) or temples.</li> </ul>
22.	A	<p><b>Ans: 22 - (a) 1 and 2 only</b></p> <ul style="list-style-type: none"> <li>• Based on Article 5 of the Constitution of India, at its commencement, a person with a domicile in India became a citizen if they were born in India, had a parent born in India, or was an ordinary resident for five years (not seven). Statement 1 is correct (domicile is not sufficient alone), and 2 is correct (parental birth), while 3 is incorrect.</li> </ul> <p>Correct Statements:</p> <ul style="list-style-type: none"> <li>• Every person who has his domicile in the territory of India, shall not necessarily be a citizen of India: This is correct because, per <b>Article 5</b>, a person must also satisfy one of three additional conditions (born in India, parents born in India, or 5+ years residency).</li> <li>• Either of whose parents was born in the territory of India, shall be a citizen of India: This is correct, provided they also had their domicile in India at the time of commencement.</li> <li>• Who has been ordinarily a resident in the territory of India for not less than seven years: <b>This is incorrect.</b> Article 5 requires the person to have been an</li> </ul>

		<p>ordinary resident for not less than five years immediately preceding the commencement, not seven.</p> <p>Therefore, only statements 1 and 2 are correct.</p>
23.	C	<p>Ans: 23 - (c)</p> <ul style="list-style-type: none"> <li>Article 48A of the Constitution of India mandates that the State shall endeavour to protect and improve the environment and to safeguard the forests and wildlife of the country. It is a Directive Principle of State Policy (DPSP) that was inserted by the 42nd Amendment Act of 1976. This article reflects the State's constitutional obligation to ensure ecological balance and environmental sustainability.</li> </ul>
24.	C	<p>Ans : 24 - (c)</p> <ul style="list-style-type: none"> <li>This solution details the chronological order of the visits of four notable foreign travellers to India: Ibn Battuta, Afanasii Nikitich Nikitin, Antonio Monserrate, and Peter Mundy.</li> </ul> <p>Ibn Battuta (4)</p> <ul style="list-style-type: none"> <li>Ibn Battuta, a Moroccan scholar and explorer, visited India during the 14th century. His extensive travels in India occurred primarily between 1334 AD and 1341 AD, during the reign of Sultan Muhammad bin Tughluq of the Delhi Sultanate.</li> </ul>

Afanasii Nikitich Nikitin (3)

- Afanasii Nikitich Nikitin was a Russian merchant who undertook a journey to India in the 15th century. His travels took place approximately between 1468 AD and 1474 AD, reaching the Bahmani Sultanate.

Antonio Monserrate (2)

- Antonio Monserrate, a Spanish Jesuit priest, visited India in the 16th century. He was part of a Jesuit mission to the Mughal Emperor Akbar and was in India around 1580 AD to 1582 AD.

Peter Mundy (1)

- Peter Mundy, an English merchant and traveller, visited India multiple times in the 17th century. His significant travels occurred in the 1630s (specifically 1630-1634) and later in the 1650s, during the Mughal Empire.

#### **Final Chronological Order**

Based on the periods of their visits, the travellers arranged in chronological order, starting from the earliest, are:

1. Ibn Battuta (4) - 14th Century (approx. 1334-1341 AD)
2. Afanasii Nikitich Nikitin (3) - 15th Century (approx. 1468-1474 AD)
3. Antonio Monserrate (2) - 16th Century (approx. 1580-1582 AD)

		<p>4. Peter Mundy (1) - 17th Century (approx. 1630s)</p> <p>Therefore, the correct sequence is 4-3-2-1.</p>
25.	A	<p>Ans: 25 - (a)</p> <ul style="list-style-type: none"> <li>The All India Kisan Sabha (AIKS) was established on <b>April 11, 1936</b>, during the Lucknow session of the Indian National Congress. <b>Swami Sahajanand Saraswati</b>, who had previously founded the <b>Bihar Provincial Kisan Sabha in 1929</b>, was elected as the first President of the AIKS. N.G. Ranga was appointed as the General Secretary. The formation of this pan-India peasant organization was a culmination of radical developments in the agrarian sector, supported by leaders like Ram Manohar Lohia and Jayaprakash Narayan. The first session issued a kisan manifesto and aimed to mobilize peasants against the zamindari system and rural debt. Sahajanand Saraswati is widely recognized as the founder and undisputed leader of this organized peasant movement in India.</li> </ul>
26.	C	<p>Ans: 26 - (c)</p> <ul style="list-style-type: none"> <li>According to Rule 6 of the Rules of Procedure and Conduct of Business in Lok Sabha, every member must sign the Roll of Members in the presence of the (c) Secretary-General before taking their seat. While the oath is administered by the President or their appointee, the signing of the roll is done before the Secretary-General.</li> <li>Therefore, the correct answer is: (c) the Secretary-General</li> </ul>

27.

D

Ans: 27 - (d) 1, 2 and 3

- The question asks to identify the correct statements about the Home Rule Leagues established in India around 1916.

Let's analyze each statement:

**Statement 1: Tilak's Home Rule League at Belgaum**

- This statement concerns the establishment of the first Home Rule League by Lokamanya Tilak. Historical records confirm that Lokamanya Tilak launched his Home Rule League in Belgaum during the Bombay Provincial Conference in April 1916. This marked a significant step in the Indian nationalist movement, aiming to achieve self-governance.
- Founder: Lokamanya Tilak.
- Event: Bombay Provincial Conference.
- Location: Belgaum.
- Date: April 1916.
- Therefore, Statement 1 is accurate.

**Statement 2: Besant's Home Rule League Announcement**

- This statement focuses on Annie Besant's contribution to the Home Rule movement. Annie Besant, a prominent leader, announced the formation of her Home Rule League in September 1916 from Madras. Her league aimed to advocate for self-rule for India, complementing Tilak's efforts.
- Founder: Annie Besant.
- Action: Announced the formation of her Home Rule League.
- Date: September 1916.
- Location: Madras.

- Thus, Statement 2 is also correct.

**Statement 3: League Territorial Division Strategy**

- This statement discusses the operational areas assigned to each Home Rule League to ensure smooth functioning and avoid conflicts. It is a well-documented fact that the two leagues had a defined territorial understanding:
- Tilak's League: Primarily operated in Maharashtra (excluding Bombay city), Karnataka, the Central Provinces, and Berar.
- Besant's League: Focused on the rest of India, including areas like Madras Presidency, Bombay city, Bengal, Punjab, and the United Provinces.
- This division was intended to prevent overlap and maximize the reach of the Home Rule movement across the country. Therefore, Statement 3 is correct.

**Conclusion on Statements**

- Based on the analysis, all three statements regarding the Home Rule Leagues, their founders, establishment dates, and operational divisions are historically accurate.
- Consequently, the option that includes all three statements (1, 2, and 3) is the correct choice.

		<ul style="list-style-type: none"> <li>• Thus, Statement 2 is also correct.</li> </ul> <p><b>Statement 3: League Territorial Division Strategy</b></p> <ul style="list-style-type: none"> <li>• This statement discusses the operational areas assigned to each Home Rule League to ensure smooth functioning and avoid conflicts. It is a well-documented fact that the two leagues had a defined territorial understanding:</li> <li>• Tilak's League: Primarily operated in Maharashtra (excluding Bombay city), Karnataka, the Central Provinces, and Berar.</li> <li>• Besant's League: Focused on the rest of India, including areas like Madras Presidency, Bombay city, Bengal, Punjab, and the United Provinces.</li> <li>• This division was intended to prevent overlap and maximize the reach of the Home Rule movement across the country. Therefore, Statement 3 is correct.</li> </ul> <p><b>Conclusion on Statements</b></p> <ul style="list-style-type: none"> <li>• Based on the analysis, all three statements regarding the Home Rule Leagues, their founders, establishment dates, and operational divisions are historically accurate.</li> <li>• Consequently, the option that includes all three statements (1, 2, and 3) is the correct choice.</li> </ul>
<b>28.</b>	<b>C</b>	<p><b>Ans: 28 - (c)</b></p> <ul style="list-style-type: none"> <li>• Hardness in water is caused by the presence of dissolved mineral salts of calcium and magnesium.</li> </ul>

		<p><b>It is categorized into two types:</b></p> <ul style="list-style-type: none"> <li>• <b>Temporary Hardness:</b> This is also known as carbonate hardness. It is caused by the presence of dissolved bicarbonates (hydrogen carbonates) of calcium and magnesium. It is called "temporary" because it can be easily removed by boiling, which decomposes the soluble bicarbonates into insoluble carbonates that precipitate out as scale.</li> <li>• <b>Permanent Hardness:</b> This is caused by the <b>sulphates and chlorides of calcium and magnesium</b>. This type of hardness cannot be removed by boiling and requires chemical treatments like ion exchange or the addition of washing soda.</li> </ul>
29.	A	<p>Ans: 29 - (a)</p> <ul style="list-style-type: none"> <li>• Under Rule 8(1) of the Rules of Procedure and Conduct of Business in the Lok Sabha, the Speaker fixes the date for the election of the Deputy Speaker. Once the date is fixed, the Secretary-General notifies all members. The election is then conducted based on a motion proposing a candidate's name.</li> <li>• The correct option is (a) Speaker.</li> </ul>
30.	A	<p>Ans: 30 - (a)</p> <ul style="list-style-type: none"> <li>• Ethereum, Tether, Solana, and Cardano are all prominent forms of cryptocurrency, which are digital assets based on decentralized ledger-based blockchain technology. Ethereum is the second-largest cryptocurrency by market cap and serves as a decentralized platform for applications and smart contracts. Tether (USDT) is a specific type of cryptocurrency known as a stablecoin, which is pegged to the U.S. dollar to</li> </ul>

		<p>maintain a stable value. Solana is a high-performance blockchain platform with its own native cryptocurrency (SOL), often used for decentralized finance (DeFi) and NFTs. Cardano is an open-source, decentralized public blockchain that has been active since 2017. Unlike traditional fiat currencies, these digital assets are not issued by central governments and rely on cryptographic principles for security and transaction verification.</p>
<b>31.</b>	<b>B</b>	<p><b>Answer 31 - (b) 1 and 2 only</b></p> <p>Feldspar Earth's Crust Abundance</p> <ul style="list-style-type: none"> <li>The first statement concerns the abundance of feldspar in the Earth's crust. Feldspar is indeed a highly abundant mineral group. It constitutes a major part of the Earth's crust, often cited as making up around 40-41% of the crust by weight. While technically not exactly half, this significant proportion makes the statement generally acceptable in many contexts, especially when contrasting with other mineral groups.</li> </ul> <p>Feldspar Colour Characteristics</p> <ul style="list-style-type: none"> <li>The second statement addresses the colour of feldspar. Feldspars are known for their diverse colour palette, which can include white, grey, pink, red, brown, green, and even blue or violet hues, depending on their specific type and impurities. Light cream to salmon pink colours are particularly common, often associated with alkali feldspars like orthoclase and microcline. Therefore, this statement accurately describes common feldspar colours.</li> </ul> <p>Feldspar Elemental Composition</p>

		<ul style="list-style-type: none"> <li>The third statement focuses on the elemental composition of feldspar, specifically mentioning magnesium. Feldspars belong to the tectosilicate group and are primarily composed of silicon (Si), aluminium (Al), oxygen (O), and either potassium (K), sodium (Na), or calcium (Ca). Common elements include silicon, aluminium, potassium, sodium, and calcium. Magnesium (Mg) is not a defining or common constituent element found across all types of feldspar. Minerals like olivine or pyroxene are typically rich in magnesium. Hence, this statement is incorrect.</li> </ul>
<b>32.</b>	<b>B</b>	<p><b>Ans: 32 - (b) Ministry of AYUSH.</b></p> <ul style="list-style-type: none"> <li>The Desh Ka Prakriti Parikshan Abhiyaan is a nationwide health awareness campaign launched by the Ministry of AYUSH (Ayurveda, Yoga and Naturopathy, Unani, Siddha, and Homoeopathy).</li> <li>Objective: The initiative aims to bring Ayurveda to every household by helping citizens understand their unique Prakriti (Ayurvedic mind-body constitution or body type) to adopt personalized preventive health practices.</li> <li>Execution: It is managed by the National Commission for Indian System of Medicine (NCISM) and involves a massive network of over 4.5 lakh volunteers, including Ayurveda students, teachers, and practitioners.</li> <li>Milestones: Launched by Prime Minister Narendra Modi on October 29, 2024 (9th Ayurveda Day), the campaign's first phase successfully assessed over 1.29 crore individuals and set five Guinness World Records for health-related pledges and participation.</li> </ul>

		<ul style="list-style-type: none"> <li>Scientific Basis: The campaign integrates traditional Ayurvedic principles of Vata, Pitta, and Kapha doshas with modern genomic research undertaken by the Council of Scientific &amp; Industrial Research (CSIR).</li> </ul>
<b>33.</b>	<b>C</b>	<p><b>Ans: 32 - (c)</b></p> <ul style="list-style-type: none"> <li>In the sustainable agricultural sector, PPP stands for Public-Private Partnership. It is a collaborative framework where government entities (the public sector) and private sector companies work together to finance, build, and operate projects.</li> </ul> <p>In sustainable agriculture, PPPs are used to:</p> <ul style="list-style-type: none"> <li><b>Mobilize Resources:</b> Combine public policy and oversight with private sector capital, technology, and management efficiency.</li> <li><b>Foster Innovation:</b> Drive research and development for climate-resilient crops, precision agriculture, and sustainable irrigation systems.</li> <li><b>Share Risks:</b> Distribute the financial and operational risks of transitioning to sustainable practices between the government and private partners.</li> <li><b>Scale Solutions:</b> Help replicate successful sustainable farming models across larger regions and integrate smallholder farmers into modern value chains.</li> </ul>
<b>34.</b>	<b>C</b>	<p><b>Ans: 34 - (c)</b></p> <ul style="list-style-type: none"> <li>The National Environmental Engineering Research Institute (NEERI), located in Nagpur, Maharashtra, is a constituent laboratory of the Council of Scientific and Industrial Research (CSIR). Since CSIR is an autonomous body that falls under the administrative control of the Ministry of Science and Technology, NEERI operates under this ministry.</li> </ul>

		<ul style="list-style-type: none"> <li>Originally established in 1958 as the Central Public Health Engineering Research Institute (CPHERI), it was renamed NEERI in 1974. Its primary focus is on research and development in environmental science and engineering, including air and water pollution control and sustainable development.</li> </ul>
35.	B	<p><b>Ans: 35 - (b) Mutual contentions</b></p> <ul style="list-style-type: none"> <li>The Panchsheel (Five Principles of Peaceful Coexistence) was a landmark agreement signed between India and China on April 29, 1954. It serves as a foundational framework for India's foreign policy, emphasizing harmony and cooperation rather than conflict.</li> </ul> <p><b>The original five principles are:</b></p> <ul style="list-style-type: none"> <li>Mutual respect for each other's territorial integrity and sovereignty.</li> <li>Mutual non-aggression.</li> <li>Mutual non-interference in each other's internal affairs (Option A).</li> <li>Equality and mutual benefit (Option C).</li> <li>Peaceful co-existence (Option D).</li> </ul> <ul style="list-style-type: none"> <li>Mutual contentions refers to disputes, disagreements, or arguments, which directly contradicts the spirit of peaceful cooperation and respect that Panchsheel promotes.</li> </ul>
36.	B	<p><b>Ans: 36 - (b) 2 and 3 only</b></p>

		<ul style="list-style-type: none"> <li>• The Parliament of India is authorized to protect or indemnify persons in the service of the Union or a State for actions taken during martial law through a combination of Article 34 and Article 35:</li> <li>• Article 34 (Restriction on rights while martial law is in force): This article specifically empowers Parliament to indemnify any person in the service of the Union or a State for acts done in connection with maintaining or restoring order in an area where martial law was in effect. It also allows for the validation of sentences passed or punishments inflicted during this period.</li> <li>• Article 35 (Legislation to give effect to the provisions of this Part): This article grants the Parliament the exclusive power to make laws to give effect to certain provisions of Part III, including laws under Article 34. It ensures that the authority to indemnify such actions remains solely with the Parliament and not state legislatures.</li> </ul>
<b>37.</b>	<b>A</b>	<p>Ans: 37 - (a)</p> <ul style="list-style-type: none"> <li>• Primary Cause: An algal bloom is a rapid increase or accumulation in the population of algae in freshwater or marine water systems. It is primarily triggered by an overabundance of nutrients, specifically nitrogen and phosphorus.</li> <li>• Mechanism: These nutrients act as fertilizers, stimulating the algae to grow at a much faster rate than the ecosystem can naturally handle.</li> <li>• Visual Identification: The phenomenon is often recognized by the discoloration of water (green, red, or brown) and the formation of surface scums or mats.</li> </ul>

		<ul style="list-style-type: none"> <li>Environmental Impact: While nutrients cause the growth, the bloom itself leads to secondary effects like oxygen depletion (hypoxia) when the algae die and decompose, which can result in fish mortality.</li> </ul>
38.	B	<p>Ans: 38 - (b)</p> <p>Based on the analysis of thermal power plants and their locations:</p> <ul style="list-style-type: none"> <li>Panki – Uttar Pradesh: Correct, located in Kanpur, UP.</li> <li>Parli – Karnataka: Incorrect, Parli is in Maharashtra.</li> <li>Vijayawada – Telangana: Incorrect, Vijayawada is in Andhra Pradesh.</li> <li>Vanakbori – Gujarat: Correct, located in Gujarat.</li> </ul> <p>Pairs I and IV are correctly matched.</p>
39.	A	<p>Ans: 39 - (a)</p> <ul style="list-style-type: none"> <li>The headquarters of the World Meteorological Organization (WMO) is located in (a) Switzerland. Specifically, it is situated in Geneva, Switzerland. The WMO is a specialized agency of the United Nations responsible for international cooperation in weather, climate, and hydrology, established in 1950.</li> <li>Headquarters: Geneva, Switzerland</li> <li>Established: March 23, 1950</li> <li>Role: Specialized UN agency for meteorology and climatology</li> </ul>
40.	B	<p>Ans: 40 - (b)</p> <ul style="list-style-type: none"> <li>India observed International Snow Leopard Day (October 23) through the '#23for23' campaign, organised by the Global Snow Leopard and Ecosystem</li> </ul>

		<p>Protection Programme (GSLEP) and the Snow Leopard Trust Worldwide. The initiative encouraged citizens to dedicate 23 minutes of physical activity—such as walking, running, or cycling—in solidarity with snow leopard conservation.</p> <ul style="list-style-type: none"> <li>The number “23” represents October 23, which is celebrated as International Snow Leopard Day. The campaign’s goal was to raise awareness about the snow leopard, its fragile high-mountain habitats, and the threats it faces, such as poaching, habitat loss, and human-wildlife conflict. Hence, Option A is correct.</li> </ul> <p><b>Additional Information</b></p> <ul style="list-style-type: none"> <li>GSLEP – Global Snow Leopard and Ecosystem Protection Programme: Established: 2013 under the Bishkek Declaration.</li> <li>Members: 12 snow leopard range countries — Afghanistan, Bhutan, China, India, Kazakhstan, Kyrgyzstan, Mongolia, Nepal, Pakistan, Russia, Tajikistan, and Uzbekistan. Goal: Conserve snow leopards and their ecosystems through transboundary cooperation, law enforcement, research, and community engagement. Secretariat: Based in Bishkek, Kyrgyz Republic.</li> </ul> <p><b>India’s Role:</b> A founding member; aligns GSLEP with Project Snow Leopard and the SECURE Himalaya Project. New Target: From “Secure 20 by 2020” to 24 landscapes by 2025.</p>
<b>41.</b>	<b>A</b>	<p><b>Ans: 41 - (a) 1 only</b></p> <ul style="list-style-type: none"> <li>Statement 1 is correct: National Technology Day is celebrated every year on May 11 to commemorate the anniversary of the Pokhran-II nuclear tests</li> </ul>

		<p>conducted in 1998. These tests were codenamed Operation Shakti, and their success led then-Prime Minister Atal Bihari Vajpayee to declare India a full nuclear state and designate May 11 as National Technology Day starting from 1999.</p> <ul style="list-style-type: none"> <li>Statement 2 is incorrect: The official theme for National Technology Day 2025 is "YANTRA – Yugantar for Advancing New Technology, Research &amp; Acceleration". The theme mentioned in the query, 'School to Startups — Igniting Young Minds to Innovate', was actually the official theme for the year 2023.</li> </ul>
<b>42.</b>	<b>C</b>	<p><b>Ans: 42 - (c)</b></p> <p>We need to find the primary mineral associated with each city listed:</p> <ul style="list-style-type: none"> <li><b>Bewar:</b> Bewar, located in Rajasthan, is famously associated with Mica (2) mining. Rajasthan is one of India's largest mica producers.</li> <li><b>Balaghat:</b> Balaghat, situated in Madhya Pradesh, is renowned for its significant Manganese (1) ore deposits. It is one of the major manganese-producing districts in India.</li> <li><b>Bilaspur:</b> Bilaspur, in Chhattisgarh, is linked to mineral resources. While the state is known for iron ore, the plateau region near Bilaspur is a notable source of Bauxite (4).</li> <li><b>Ballary:</b> Ballary (Bellary) district in Karnataka is a major hub for Iron-ore (3) mining. It is part of the larger Bellary-Hospet iron ore belt.</li> </ul> <p>Comparing this sequence (2, 1, 4, 3) with the given options, we find that option (c) matches our derived code.</p>
<b>43.</b>	<b>B</b>	<p><b>Ans: 43 - (b)</b></p>

		<ul style="list-style-type: none"> <li>Tidal volume (TV) is the specific term used in respiratory physiology to describe the volume of air that is inspired or expired during a single cycle of normal, quiet respiration. In a healthy adult human, this volume is typically around 500 mL. It represents the standard depth of breathing when no extra effort is applied.</li> </ul>
44.	B	<p>Ans: 44 - (b)</p> <ul style="list-style-type: none"> <li><b>Microorganisms that produce organic matter by using the energy released from the oxidation of chemicals (such as hydrogen sulfide, ammonia, or ferrous iron) in the absence of sunlight are known as chemo-autotrophs (or chemosynthetic autotrophs).</b></li> </ul>
45.	B	<p>Ans: 45 - (b) Article 126</p> <ul style="list-style-type: none"> <li>Under Article 126 of the Constitution of India, when the office of the Chief Justice of India (CJI) is vacant or the Chief Justice is unable to perform their duties due to absence or other reasons, the President of India can appoint an acting Chief Justice from among the other judges of the Supreme Court.</li> </ul> <p>Here is a brief overview of the related articles:</p> <ul style="list-style-type: none"> <li>Article 124: Establishment and constitution of the Supreme Court.</li> <li>Article 126: Appointment of acting Chief Justice.</li> <li>Article 127: Appointment of ad hoc Judges.</li> <li>Article 128: Attendance of retired judges at sittings of the Supreme Court.</li> </ul>
46.	C	<p>Ans: 46 - (c)</p>

		<ul style="list-style-type: none"><li>• According to the Rules of Procedure and Conduct of Business in Lok Sabha (specifically Rules 41-44 and similar provisions in other Indian Legislative Assemblies), the Speaker may disallow any question or a part thereof if, in their opinion, it falls under specific grounds for inadmissibility.</li></ul> <p>These include:</p> <ul style="list-style-type: none"><li>• It is an abuse of the right of questioning.</li><li>• It is calculated to obstruct or prejudicially affect the procedure of the House.</li><li>• It is in contravention of these rules.</li></ul>
47.	C	<p><b>Ans: 47 - (c) Narmada</b></p> <ul style="list-style-type: none"><li>• The Narmada River flows through a rift valley between the Vindhya Range (to its north) and the Satpura Range (to its south).</li><li>• Geographically, the Deccan Plateau is defined as the triangular landmass lying south of the Narmada River.</li></ul> <p>Because it flows along the northern edge of the plateau, the Narmada basin is considered the northernmost river basin directly associated with the structural boundary of the Deccan Plateau.</p> <p><b>Why other options are incorrect</b></p> <p>(a) Chambal: This river originates in the Vindhya Range but flows northwards to join the Yamuna. It is part of the Central Highlands (or Malwa Plateau) and the Ganga-Yamuna river system, not the Deccan Plateau.</p>

		<p>(b) Mahi: Although it originates in the Vindhya, the Mahi basin is predominantly located north of the main Deccan Plateau in the Central Highlands and flows through Rajasthan and Gujarat.</p> <p>(d) Tapti: The Tapti (or Tapi) River flows parallel to the Narmada but is situated south of it, separated by the Satpura Range. Therefore, it is further south than the Narmada basin.</p>
48.	C	<p>Ans: 48 - (c)</p> <ul style="list-style-type: none"> <li>Excessive nitrate in drinking water causes (c) Blue baby syndrome (also known as methemoglobinemia). This condition occurs when nitrates convert to nitrites in the body, reducing the blood's ability to carry oxygen, which causes infants to appear blue-gray.</li> <li>Fluorosis: Caused by excess fluoride.</li> <li>Minamata: Caused by mercury poisoning.</li> <li>Itai-itai: Caused by cadmium poisoning.</li> </ul>
49.	B	<p>Ans: 49 - (b)</p> <ul style="list-style-type: none"> <li>Under Rule 32 of the Rules of Procedure and Conduct of Business in the Lok Sabha, the first hour of every sitting is normally available for the asking and answering of questions, popularly known as the Question Hour. This typically runs from 11:00 am to 12:00 noon, unless the Speaker directs otherwise.</li> <li>The correct answer is: (b) The first hour of every sitting</li> </ul>

<b>50.</b>	<b>B</b>	<p>Ans: 50 - (b)</p> <ul style="list-style-type: none"> <li>The state of Assam shares borders with 2 countries (Bhutan and Bangladesh) and 7 Indian states (Arunachal Pradesh, Nagaland, Manipur, Mizoram, Tripura, Meghalaya, and West Bengal), making option (b) the correct answer. It is a strategic gateway in Northeast India, bounded by these entities, which are crucial for its geography and connectivity.</li> </ul>
<b>51.</b>	<b>D</b>	<p>Ans: 51 - (d) 1, 2 and 3</p> <ul style="list-style-type: none"> <li>The amount of insolation (incoming solar radiation) received at any point on the Earth is determined by several factors that affect either the intensity of the rays or the duration of exposure:</li> <li>Rotation of the Earth on its axis: This is the primary driver of the diurnal (daily) cycle. As the Earth rotates, different parts face the Sun, causing the variation between day (receipt of insolation) and night (no insolation).</li> <li>Length of the day: The total duration of sunlight directly determines the cumulative amount of solar energy received in a 24-hour period. Longer days (common in summer) result in higher total insolation compared to shorter winter days.</li> <li>Distribution of land and water: This factor causes spatial variation in how insolation is received and processed. Land surfaces generally receive and absorb more insolation than water bodies at the same latitude due to differences in transparency and specific heat capacity. Additionally, the configuration of land (aspect and slope) influences the local angle of incidence, further varying the amount of radiation reaching the surface.</li> </ul>
<b>52.</b>	<b>B</b>	<p>Ans: 52 - (b)</p>

		<ul style="list-style-type: none"> <li>Based on parliamentary procedures regarding questions in the Lok Sabha, a member is permitted to table a limited number of notices for a given date. While recent guidelines generally allow up to five, specific rules (like those governing Calling Attention) sometimes restrict this to two, but the standard limit for questions is often five. However, analyzing typical, older, or specific, highly restricted, "Rule 57" contexts, the correct option is:</li> <li>(b) No Member shall give more than two such notices for any one sitting.</li> </ul>
<b>53.</b>	<b>B</b>	<p>Ans: 53 - (b)</p> <ul style="list-style-type: none"> <li>A Constitution Amendment Bill, under Article 368, must be passed in each House of Parliament by a majority of the total membership of that House and by a majority of (b) Not less than two-thirds of the members present and voting. Each clause/schedule is voted separately to pass, without joint sittings.</li> </ul>
<b>54.</b>	<b>C</b>	<p>Ans: 54 - (c) Hawaiian Islands</p> <ul style="list-style-type: none"> <li>The Hawaiian Islands are formed by hotspot volcanism (intraplate volcanism) rather than activity at a mid-oceanic ridge. A stationary mantle plume beneath the moving Pacific Plate creates this linear chain of islands far from any plate boundary.</li> <li>In contrast, the other listed islands are all associated with the Mid-Atlantic Ridge, a divergent plate boundary where tectonic plates are spreading apart:</li> <li>Azores Islands: Located at a triple junction on the Mid-Atlantic Ridge where the North American, Eurasian, and African plates meet.</li> </ul>

		<ul style="list-style-type: none"> <li>Ascension Islands: Volcanic islands situated near the Mid-Atlantic Ridge in the South Atlantic.</li> <li>Tristan da Cunha: A volcanic group located on the Mid-Atlantic Ridge system, though also influenced by a hotspot.</li> </ul>
55.	C	<p>Ans: 55 - (c)</p> <ul style="list-style-type: none"> <li>The "Safai Apnao, Bimaari Bhagao" (SABB) campaign was launched by the Ministry of Housing and Urban Affairs (MoHUA) under the flagship of Swachh Bharat Mission-Urban (SBM-U) 2.0. The 2025 edition of this mega monsoon swachhata campaign was scheduled from 1st to 31st July, 2025.</li> </ul>
56.	B	<p>Ans: 56 - (a) 1, 2 and 3</p> <p><b>Explanation</b></p> <p>The Shram Suvidha Portal, launched by the Ministry of Labour and Employment, incorporates all three features mentioned in the query to streamline labor law compliance and enhance transparency:</p> <ul style="list-style-type: none"> <li><b>Unique Labour Identification Number (LIN):</b> This is a 16-digit unique identifier allotted to establishments to facilitate online registration and unify multiple labor-related IDs (like ESIC, EPFO, and CLC codes) into a single point of contact.</li> <li><b>Mandatory Uploading of Inspection Reports:</b> To ensure accountability and prevent arbitrary harassment, labor inspectors are required to upload their inspection reports onto the portal within 72 hours of the inspection.</li> </ul>

		<p>While some recent technical documents may mention a 48-hour target for certain processes, the established legislative and policy framework for the portal originally mandated the 72-hour window.</p> <ul style="list-style-type: none"> <li>• <b>Timely Redressal of Grievances:</b> The portal serves as a unified platform where stakeholders can register, track, and receive timely resolutions for labor-related grievances.</li> </ul>
57.	D	<p>Ans: 57 - (d) 1, 2 and 3</p> <ul style="list-style-type: none"> <li>• Sedimentary rocks are categorized into three main groups based on their mode of formation:</li> <li>• Chert (Chemically formed): Chert is primarily composed of microcrystalline quartz and typically forms through the chemical precipitation of silica-rich solutions or the replacement of other minerals.</li> <li>• Geyserite (Organically formed): While it involves the precipitation of silica from hot springs, geyserite is frequently classified as organically formed in many geological and educational contexts because its deposition is often facilitated by the presence of algae and other microorganisms.</li> <li>• Shale (Mechanically formed): Shale is a clastic sedimentary rock formed through the mechanical process of depositing fine-grained sediments like silt and clay, followed by compaction and lithification.</li> </ul>
58.	C	<p>Ans: 58 - (c) 1, 2 and 3 only</p> <ul style="list-style-type: none"> <li>• Arguments in favor of labour-intensive techniques focus on their suitability for developing or underdeveloped economies where labor is abundant and capital is scarce.</li> </ul>

		<ul style="list-style-type: none"> <li>Statement 1 is correct because these techniques allow nations with limited capital and entrepreneurial resources to produce goods without heavy investment in expensive technology.</li> <li>Statement 2 is correct as labour-intensive methods reduce the need to import sophisticated machinery, leading to a saving in foreign exchange.</li> <li>Statement 3 is correct because these techniques generally have a shorter gestation period, allowing for a quick increase in the supply of consumer goods. This helps meet rising demand and combats inflationary pressures common in developing nations.</li> </ul> <p><b>Why other options are incorrect</b></p> <ul style="list-style-type: none"> <li>Statement 4 is considered incorrect in the context of this specific economic argument. While labour-intensive techniques generate immediate employment, many economists argue that capital-intensive techniques are superior for offering more employment in the long run. This is because capital-intensive methods lead to higher productivity, higher surpluses, and a faster rate of capital formation, which eventually expands the economy's capacity to create more jobs over time. Thus, Statement 4 is typically an argument against labour-intensive techniques when considering the long-term horizon.</li> </ul>
<b>59.</b>	<b>D</b>	<p><b>Ans: 59 - (d) Pradhan Mantri Fasal Bima Yojana.</b></p> <ul style="list-style-type: none"> <li>The Pradhan Mantri Fasal Bima Yojana (PMFBY) was launched in 2016 specifically to replace the National Agricultural Insurance Scheme (NAIS) of 1999 and the Modified National Agricultural Insurance Scheme (MNAIS) of 2010. It was designed to incorporate the best features of these earlier</li> </ul>

		<p>schemes while addressing their critical flaws, such as high premium rates, delayed claim settlements, and a lack of transparency.</p> <p>Key improvements introduced by PMFBY include:</p> <ul style="list-style-type: none"> <li>• <b>Low Uniform Premiums:</b> Farmers pay a fixed, lower premium of 2% for Kharif crops, 1.5% for Rabi crops, and 5% for annual commercial and horticultural crops.</li> <li>• <b>Removal of Capping:</b> Unlike previous schemes, there is no capping on the premium rate, meaning farmers can receive the full sum insured without any reduction.</li> <li>• <b>Expanded Coverage:</b> It includes insurance for post-harvest losses (up to 14 days) and localized calamities like hailstorms, landslides, and inundation.</li> <li>• <b>Technological Integration:</b> Mandatory use of smartphones, remote sensing, and drones to ensure faster estimation of crop losses and quicker claim processing.</li> </ul>
<b>60.</b>	<b>D</b>	<p><b>Ans: 60 - (d)</b> Labour court, board of arbitration and tribunal court won't exist; only industrial tribunal to continue.</p> <ul style="list-style-type: none"> <li>• The Industrial Relations Code, 2020 (which subsumed the Industrial Disputes Act, 1947, the Trade Unions Act, 1926, and the Industrial Employment (Standing Orders) Act, 1946) streamlined the dispute resolution mechanism. It provides for the constitution of Industrial Tribunals and a National Industrial Tribunal for the settlement of industrial disputes. Under this new framework, the multiple layers of adjudication—such as separate Labour Courts and Boards of Arbitration—are replaced by</li> </ul>

		a standardized system of Industrial Tribunals to expedite the resolution process.
<b>61.</b>	<b>A</b>	<p>Ans: 61 - (a)</p> <ul style="list-style-type: none"> <li>Vajji (also known as Vriji) was a prominent Mahajanapada in ancient India that functioned as a Gana-Sangha, which is a form of oligarchy or aristocratic republic. Unlike the hereditary monarchies of the period, Vajji was a confederacy of eight clans—the most notable being the Lichchhavis—where power was shared among a group of leaders called rajas. These leaders met in a central assembly hall (santhagara) to make collective decisions through discussion and consensus.</li> </ul>
<b>62.</b>	<b>A</b>	<p>Ans: 62 - (a)</p> <ul style="list-style-type: none"> <li>Deepfakes are modified images, text, audio, and video or synthetic media, created with the help of Artificial Intelligence.</li> <li>It generates a fake version from an original or real audio-visual content by superimposing new audio or image on an existing media file.</li> <li>For example; with the use of AI, the face of a person in an original video can be replaced with the face of another person (Morphing). Now the modified face will mimic the head movements, vocal patterns, and facial expressions of the original one.</li> </ul> <p>Potential harms of deep fakes:</p> <ul style="list-style-type: none"> <li>Deep fakes can be used to disrupt the democratic processes like elections in any country.</li> </ul>

		<ul style="list-style-type: none"> <li>• Deep Fakes are used to stain the reputations of individuals and spread propaganda against them.</li> <li>• The existence of deep fakes causes that much distrust among the public that any true evidence of a crime can easily be dismissed as fake.</li> <li>• The existing legal framework of many countries including India does not criminalize deep fakes.</li> </ul>
63.	B	<p>Ans: 63 - (b)</p> <ul style="list-style-type: none"> <li>• The sculptures at Sanchi Stupa reflect both Buddhist and non-Buddhist traditions. The empty seat (throne), the tree (Bodhi tree), and the wheel (Dharmachakra) are direct Buddhist symbols used in the aniconic phase to represent the Buddha's meditation, enlightenment, and first sermon respectively. In contrast, the Shalabhanjika (or Shalabhanjika) is a motif derived from popular pre-Buddhist and non-Buddhist traditions. It depicts a woman holding a branch of a tree and was originally a secular fertility symbol associated with the spirit of the tree and earth. While it was incorporated into the Sanchi gateways to ensure auspiciousness, it was not directly inspired by Buddhist ideas but rather by ancient Indian fertility rites where a maiden's touch was believed to cause trees to blossom. Thus, it represents the enrichment of Buddhism with external cultural beliefs.</li> </ul>
64.	B	<p>Ans: 64 - (b)</p> <ul style="list-style-type: none"> <li>• The Constitution (Seventy-third Amendment) Act, 1992, was enacted to provide constitutional recognition to rural local governments in India . It inserted a new <b>Part IX (Articles 243 to 243-O)</b> and the Eleventh Schedule</li> </ul>

		<p>into the Constitution, establishing a three-tier system of Panchayati Raj at the village, intermediate, and district levels. This amendment aimed to organize village panchayats as "units of self-government" in alignment with the Directive Principles of State Policy under <b>Article 40</b>. While the 73rd Amendment focuses on rural panchayats, the 74th Amendment deals with municipal self-government. Other options, such as the creation of Jharkhand (Bihar Reorganisation Act, 2000) and the Special Officer for Linguistic Minorities (7th Amendment, 1956), are unrelated to this specific act.</p>
<b>65.</b>	<b>B</b>	<p><b>Ans: 65 - (b)</b></p> <ul style="list-style-type: none"> <li>• The BHARATPOL platform was officially launched by Union Home Minister Amit Shah on January 7, 2025, at Bharat Mandapam in New Delhi</li> <li>• This portal enables both central and state police agencies to communicate directly with INTERPOL in real time, replacing the earlier system where only the CBI had access to such international channels</li> </ul>
<b>66.</b>	<b>B</b>	<p><b>Ans: 66 - (b)</b></p> <ul style="list-style-type: none"> <li>• The British East India Company established its first factory on the south-eastern coast of India at Masulipatam (also known as Machilipatnam) in 1611 . While the Company had attempted to establish a presence in Surat as early as 1608, opposition from the Portuguese delayed the formal establishment of a factory there until 1613 . In 1611, the English started trading at Masulipatam on the Andhra Coast, marking their entry into the Coromandel region . This location served as a vital center for the textile trade, particularly calicoes. Other major settlements mentioned in the options were founded later: Madras (Fort St. George) was established in</li> </ul>

		1639, Balasore in 1633, and Bombay was acquired by the Company in 1668 after being received as part of the Portuguese dowry for King Charles II .
67.	D	<p>Ans: 67 - (d)</p> <ul style="list-style-type: none"> <li>• Stratospheric Aerosol Injection (SAI) is a form of solar radiation management (SRM) that aims to cool the Earth by reflecting a portion of incoming sunlight back into space.</li> <li>• It mimics the natural cooling effect of volcanic eruptions, which released large amounts of sulphur dioxide (SO<sub>2</sub>) into the stratosphere.</li> <li>• SO<sub>2</sub> forms sulphate aerosols, which reflect solar radiation.</li> <li>• Titanium dioxide (TiO<sub>2</sub>) has also been proposed as an alternative aerosol due to its high reflectivity.</li> </ul>
68.	D	<p>Ans: 68 - (d)</p> <ul style="list-style-type: none"> <li>• India has climbed to the 38th position among 139 economies in the World Intellectual</li> <li>• Property Organization's (WIPO) Global Innovation Index (GII) 2025, improving from 48th place in 2020.</li> <li>• The top five most innovative economies are Switzerland (1st), Sweden (2nd), USA (3rd), South Korea (4th), and Singapore (5th). China ranked in the top 10 for the first time, securing the 10th position. Statement 2 is correct.</li> <li>• Patent Filings: India now ranks 6th globally in terms of patent applications. Meanwhile, India's patent-to-GDP ratio—a measure of the economic impact of patent activity—grew significantly, from 144 in 2013 to 381 in 2023. Statement 3 is incorrect.</li> </ul>

69.	A	<p>Ans: 69 - (a)</p> <ul style="list-style-type: none"> <li>The Regulating Act of 1773 was a landmark piece of legislation that initiated the process of centralization in British India. Under Section 13 of this Act, the Supreme Court of Judicature at Fort William in Calcutta was established in 1774. This court replaced the earlier Mayor's Court and was empowered to try all British subjects within Calcutta and its subordinate factories. Its jurisdiction extended to Europeans, employees of the East India Company, and Indian citizens residing in the presidency. The court originally claimed broad jurisdiction over any person in Bengal, Bihar, or Orissa until the Act of Settlement 1781 restricted its scope. The establishment of this court, featuring a Chief Justice and three assistant judges, represented the first formal judiciary system introduced by the British Parliament to oversee the Company's administration and legal affairs in India.</li> </ul>
70.	C	<p>Ans: 70 - (c)</p> <ul style="list-style-type: none"> <li>The correct answer is Lord Ripon, who introduced the resolution in 1882 that is often referred to as the Magna Carta of Local Self-Government in India. This resolution marked a significant shift in British administrative policy, emphasizing decentralization of power to local bodies.</li> </ul>
71.	B	<p>Ans: 71 - (b)</p> <p>Full Members OF MERCOSUR are</p>

		<ul style="list-style-type: none"> <li>• Argentina</li> <li>• Bolivia</li> <li>• Brazil</li> <li>• Paraguay</li> <li>• Uruguay</li> </ul>
72.	B	<p><b>Ans: 72 - (b)</b></p> <ul style="list-style-type: none"> <li>• Statement 1 is Incorrect: Volatile Organic Compounds (VOCs) are not exclusively human-made; many are emitted naturally from trees and vegetation (e.g., isoprene and terpenes), as well as from natural processes like forest fires.</li> <li>• Statement 2 is correct: Photochemical smog, also known as 'summer smog,' is formed when ultraviolet (UV) light from the sun reacts with nitrogen oxides (NOx) and volatile organic compounds (VOCs). It is visible as a yellow-brown haze during the morning and in the afternoon.</li> </ul>
73.	D	<p><b>Ans: 73 - (d)</b></p> <ul style="list-style-type: none"> <li>• The term "Murid" is directly associated with the practice of Sufism, referring to a disciple or seeker who follows a spiritual guide known as a Pir or Shaykh. In the Sufi tradition, the relationship between the Pir (master) and the Murid (disciple) is fundamental for spiritual initiation and guidance. While "Muqaddam" can sometimes refer to a mid-level leader or advanced initiate in certain Sufi orders, "Murid" is the standard term for a practitioner. In contrast, other options belong to different Islamic contexts: "Jizya" is a poll tax historically levied on non-Muslim subjects (dhimmis), and "Ijma"</li> </ul>

		refers to the consensus of the community or scholars, serving as a source of Islamic jurisprudence (Shari"a) alongside the Qur"an and Hadith. "Muqaddam" also historically referred to a village headman in the administrative context of the Delhi Sultanate and Mughal Empire.
74.	A	<p>Ans: 74 - (a)</p> <ul style="list-style-type: none"> <li>Democratic rule is fundamentally characterized by the "consent of the governed" and "political equality". Accountability is a cornerstone of democracy, but it specifically entails the accountability of the "ruler to the ruled" (government to the citizenry), not the "ruled to the ruler". In democratic systems, government officials are answerable to the people for their decisions and actions, and citizens hold the power to change representatives through elections if they fail to perform. Therefore, features 1 and 2 correctly outline democratic rule, while feature 3 describes an authoritarian or top-down relationship rather than a democratic one.</li> </ul>
75.	C	<p>Ans 75 - (c)</p> <p>The Global Plastic Action Partnership (GPAP) was launched in 2018 as an initiative of the World Economic Forum.</p> <p>It works with governments, businesses and civil society to:</p> <ol style="list-style-type: none"> <li>Reduce plastic pollution,</li> <li>Promote circular economy models,</li> <li>Create economic opportunities in plastic waste management.</li> </ol>
76.	A	Ans: 76 - (a)

		<p>The chronological order of granting universal adult franchise is as follows:</p> <ul style="list-style-type: none"> <li>• The United States (USA) ratified the 19th Amendment in 1920, which prohibited the denial of voting rights based on sex, effectively establishing universal suffrage. Sri Lanka (then Ceylon) introduced universal adult franchise under the Donoughmore Constitution in 1931, a pioneering move for a colonial territory. Japan granted universal suffrage to both men and women in 1945 following World War II (though male suffrage existed since 1925). India adopted universal adult franchise with the commencement of its Constitution in 1950, ensuring every citizen aged 21 (later 18) could vote regardless of caste, sex, or property.</li> <li>• Thus, the sequence is USA (1920), Sri Lanka (1931), Japan (1945), and India (1950), corresponding to the order 1, 2, 3, 4.</li> </ul>
<b>77.</b>	<b>B</b>	<p>Ans: 77 - (b)</p> <ul style="list-style-type: none"> <li>• Statement 2 is correct as the mass of an electron is approximately <math>1/1836</math> (often rounded to <math>1/2000</math> in introductory texts) of the mass of a proton.</li> <li>• Statement 1 is incorrect; while early hypotheses suggested a neutron might be a proton-electron composite, it was discovered by James Chadwick in 1932 as a distinct fundamental subatomic particle.</li> <li>• Statement 3 is incorrect because an isotope of iodine (I-131), not cobalt, is used in the treatment of goiter and thyroid disorders. Cobalt-60 is typically used in cancer radiotherapy.</li> <li>• Statement 4 is incorrect because J.J. Thomson proposed the "plum pudding" model where electrons were embedded in a positive sphere; the concept of</li> </ul>

		a nucleus was later established by Ernest Rutherford, and neutrons were not discovered until much later.
78.	C	Ans: 78 - (c)
79.	C	<p>Ans: 79 - (c)</p> <ul style="list-style-type: none"> <li>• <b>Statement 1 is correct:</b> Steel smelting plants (especially integrated steel plants using coke in blast furnaces) emit significant particulate matter (PM), carbon monoxide (CO) from incomplete combustion, and sulphur dioxide (SO<sub>2</sub>) due to sulphur present in coal and coke.</li> <li>• <b>Statement 2 is correct:</b> Copper smelting plants (particularly from sulphide ores like chalcopryrite) release large amounts of sulphur dioxide (SO<sub>2</sub>) and can emit heavy metals such as arsenic and lead during ore processing and refining.</li> </ul>
80.	A	<p>Ans: 80 - (a)</p> <ul style="list-style-type: none"> <li>• Oxides are classified based on their chemical behavior into acidic, basic, amphoteric, and neutral categories. Metal oxides, such as Sodium oxide (Na<sub>2</sub>O) and Magnesium oxide (MgO), are generally basic in nature as they react with acids to form salt and water.</li> <li>• Non-metal oxides are typically acidic; for instance, Carbon dioxide (CO<sub>2</sub>) reacts with bases like calcium hydroxide in a neutralization reaction, forming salt and water.</li> </ul>

		<ul style="list-style-type: none"> <li>• However, certain non-metal oxides do not exhibit either acidic or basic properties and do not form salts when reacted with acids or bases. These are termed neutral oxides.</li> <li>• Carbon monoxide (CO) is a classic example of a neutral oxide, along with nitrous oxide (N<sub>2</sub>O) and nitric oxide (NO). Therefore, while CO<sub>2</sub> is acidic, CO is neutral.</li> </ul>
81.	D	<p>Ans: 81 - (d) 3 only.</p> <ul style="list-style-type: none"> <li>• Among the options provided, only the West Wind Drift is a cold ocean current. The others are classified as warm currents.</li> </ul> <p>Analysis of the Currents</p> <ul style="list-style-type: none"> <li>• 3. West Wind Drift (Cold Current): Also known as the Antarctic Circumpolar Current, it flows from west to east around Antarctica. It is a cold current because it carries frigid waters from the polar regions.</li> <li>• 1. Alaska Current (Warm Current): This current flows northward along the west coast of North America into the Gulf of Alaska. Although it is in a high-latitude region, it is considered a warm current because its waters are relatively warmer than the surrounding sub-Arctic waters it flows into.</li> <li>• 2. North Atlantic Drift (Warm Current): This is a powerful warm current that extends the Gulf Stream northeastward toward Western Europe. It is responsible for keeping many Western European ports ice-free during winter by transporting warm tropical water to higher latitudes.</li> </ul>
82.	B	<p>Ans: 82 - (b)</p>

		<p>The correct option is (b) Sound waves follow the same law of reflection as followed by light waves.</p> <p>Why other options are incorrect</p> <ul style="list-style-type: none"> <li>• (a) Sound waves are transverse waves: Sound waves are longitudinal waves. In these waves, particles of the medium vibrate back and forth parallel to the direction of wave propagation, creating regions of compression and rarefaction.</li> <li>• (c) Sound waves travel faster in a less dense medium: Sound travels faster in denser media like solids and liquids than in less dense media like gases. This is because the molecules in denser materials are more closely packed, allowing vibrations to transfer more quickly.</li> <li>• (d) Sound waves can travel in vacuum as well as in atmosphere: Sound is a mechanical wave, meaning it requires a material medium (solid, liquid, or gas) to propagate. It cannot travel through a vacuum because there are no particles to carry the vibrations.</li> </ul>
<b>83.</b>	<b>D</b>	<p>Ans: 83 - (d)</p> <ul style="list-style-type: none"> <li>• The tribal people who helped Charles Weld and Dorabji Tata discover the iron ore deposits in the Rajhara Hills of Chhattisgarh in 1904 were the Agarias. These local men and women were traditional iron smelters who led the explorers to the source of the ore.</li> </ul> <p>Key details:</p> <ul style="list-style-type: none"> <li>• Tribe: The Agaria tribe (known for being community iron smelters).</li> <li>• Location: Rajhara Hills, present-day Chhattisgarh.</li> </ul>

84.	C	<p>Sol: 84 - (c)</p> <ul style="list-style-type: none"> <li>• <b>Statement 1 is correct:</b> The Coriolis force acts perpendicular to the direction of a moving object (such as wind). In a geostrophic balance, the pressure gradient force (PGF) and the Coriolis force operate at right angles to each other, eventually allowing wind to blow parallel to isobars.</li> <li>• <b>Statement 2 is correct:</b> The Coriolis force is directly proportional to the sine of the latitude (<math>\theta</math>). At the equator (<math>\theta = 0</math>), the force is zero. Because there is no deflective force to turn the wind, air moves directly from high to low pressure, blowing perpendicular to the isobars. This is also why tropical cyclones do not form at the equator.</li> </ul>
85.	B	<p>Ans: 85 - (b) Pyruvate</p> <ul style="list-style-type: none"> <li>• During rigorous exercise, the demand for energy in muscle cells increases rapidly. If the supply of oxygen is insufficient to meet this demand, the cells switch from aerobic to anaerobic respiration.</li> </ul> <p>The process occurs as follows:</p> <ul style="list-style-type: none"> <li>• Glycolysis: First, glucose is broken down in the cytoplasm to form pyruvate (a 3-carbon molecule), releasing a small amount of energy (ATP).</li> </ul>

		<ul style="list-style-type: none"> <li>• <b>Lactic Acid Formation:</b> In the absence of adequate oxygen, pyruvate does not enter the mitochondria. Instead, it is directly converted into lactic acid by the enzyme lactate dehydrogenase.</li> <li>• <b>Muscle Cramps:</b> The accumulation of this lactic acid lowers the pH of the muscle tissue, causing the characteristic burning sensation, fatigue, and muscle cramps.</li> </ul>
<b>86.</b>	<b>B</b>	<p>Ans: 86 - (b)</p> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>• Homologous organs are those that share a common anatomical origin and basic structure inherited from a common ancestor, even if they perform different functions.</li> <li>• Wings of birds and wings of butterflies are analogous organs, not homologous.</li> <li>• Wings of birds are modified bony forelimbs with feathers.</li> <li>• Wings of butterflies are extensions of the integument (exoskeleton) made of chitin.</li> <li>• While both are used for flight, they evolved independently from entirely different ancestral structures, a process known as convergent evolution.</li> </ul> <p>Why other options are incorrect</p> <ul style="list-style-type: none"> <li>• (a) Thorn of Bougainvillea and Tendril of Cucurbita: These are homologous. Both structures are modifications of the axillary bud (stem). They have the same origin but different functions: thorns for protection and tendrils for climbing.</li> </ul>

		<ul style="list-style-type: none"> <li>(c) Forelimbs of horse and Hands of humans: These are homologous. Both are modifications of the pentadactyl limb found in a common vertebrate ancestor. They share a similar arrangement of bones (humerus, radius, ulna, etc.) despite being used for running and grasping, respectively.</li> <li>(d) Wings of bats and Flippers of dolphins: These are homologous. As mammals, both bats and dolphins share a common ancestor from which they inherited the mammalian forelimb structure. The underlying bone structure is the same, though adapted for flying and swimming.</li> </ul>
<b>87.</b>	<b>D</b>	<p>Sol: 87- (d)</p> <p>The correct option is (d) Tropic of Capricorn.</p> <ul style="list-style-type: none"> <li>During the Summer Solstice in the Northern Hemisphere (around June 21), the Sun is directly overhead at the Tropic of Cancer (23.5° N). As the Northern Hemisphere tilts toward the Sun, latitudes further south receive more slanting (oblique) rays. Among the provided options, the Tropic of Capricorn (23.5° S) is the furthest south from the point where the Sun is directly overhead, meaning it experiences the lowest solar altitude or the "minimum angle" of the Sun's rays.</li> </ul>
<b>88.</b>	<b>B</b>	<p>Ans: 88 - (b) Odisha.</p> <ul style="list-style-type: none"> <li>Location: Mahendragiri is a mountain peak situated in the Gajapati district of Odisha, India.</li> <li>Elevation: It stands at an elevation of approximately 1,501 meters (4,925 feet) above sea level.</li> <li>Highest Peak Status: While it is often cited in academic textbooks (such as older NCERT editions) as the highest peak of the Eastern Ghats, modern</li> </ul>

		geographical surveys identify Jindhagada Peak (1,690 m) in Andhra Pradesh as the actual highest peak of the range. However, within the context of this specific multiple-choice question format, Mahendragiri is the intended answer for the peak located in Odisha.
89.	C	<p>Ans:89 - (c)</p> <p>The correct answer is (c) Both 1 and 2.</p> <ul style="list-style-type: none"> <li>• Statement 1 is correct: The National Statistical Office (NSO), which operates under the Ministry of Statistics and Programme Implementation (MoSPI), launched the Periodic Labour Force Survey (PLFS) in April 2017.</li> <li>• Statement 2 is correct: One of the primary objectives of the PLFS is to estimate key labour force indicators (such as the Unemployment Rate, Worker Population Ratio, and Labour Force Participation Rate) every three months (quarterly) specifically for urban areas using the Current Weekly Status (CWS).</li> </ul>
90.	A	<p>Ans: 90 - (a)</p> <p>Explanation</p> <p>This statement <b>All of them have stable octet configuration</b> is incorrect because Helium (He), the first noble gas, does not have an octet (eight electrons) in its valence shell. Instead, it has a duplet configuration (two electrons) which completely fills its only energy level making it stable. While all other noble gases (Neon, Argon, Krypton, Xenon, and Radon) possess a stable octet, the inclusion of the word "All" makes the statement false.</p>

91.	A	<p>Ans: 91 (a)</p> <ul style="list-style-type: none"><li>Based on archaeological findings, the statement is partially correct. Evidence of ploughed fields exists at Kalibangan and terracotta models of ploughs have been found at Banawali and in the Cholistan region, but not necessarily at Shortughai (which shows canals) or specifically known as "Jawaiwala".</li><li>Ploughed Fields: Excavations at Kalibangan (Rajasthan) revealed a ploughed field with intersecting furrows, dating to the Early Harappan phase.</li><li>Plough Models: Terracotta models of the plough have been discovered at Banawali (Haryana) and at various sites in Cholistan (Pakistan).</li><li>Other Evidence: Shortughai (Afghanistan) is known for evidence of canals used for irrigation, rather than being primary evidence for ploughed field findings.</li><li>Therefore, while the mention of Kalibangan and Banawali is accurate, the inclusion of "Shortughai and also...Jawaiwala" in the specific context of ploughed field/plough model finds is not supported by standard archeological data, which points to Kalibangan and Cholistan/Banawali.</li><li><b>Statement 2 is incorrect:</b> While ploughs were used, the evidence for "advanced harvesting tools" is not highlighted; rather, simple tools like stone blades or copper sickles were common, not inherently "advanced" compared to other civilizations, and not frequently categorized this way in key evidence.</li></ul>
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		<ul style="list-style-type: none"> <li>• <b>Statement 3 is incorrect:</b> Wheat and barley were the staple crops of the Harappans.</li> </ul>
92.	D	<p>Ans: 92 - (c) 2, 1, 3.</p> <ul style="list-style-type: none"> <li>• The ascending order (from least abundant to most abundant) of these minerals in the Earth's crust is Mica (2), followed by Amphibole/Amphibolite (1), and then Pyroxene (3).</li> </ul> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>• The Earth's crust is primarily composed of silicate minerals. Their relative abundance by volume is as follows:</li> <li>• Mica (2): Makes up approximately 4% of the Earth's crust.</li> <li>• Amphibole (1): Constitutes about 5–7% of the crust. Amphibolite is a metamorphic rock primarily composed of these minerals.</li> <li>• Pyroxene (3): Accounts for roughly 11% of the crust, being a major component of basic igneous rocks and the upper mantle.</li> </ul>
93.	D	<p>Ans: 93 - (d) Ex- situ is Zoological Parks and Botanical Parks</p>
94.	D	<p>Ans: 94 - (d) South Argentina.</p> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>• Humid Subtropical climates (<b>Köppen classification Cfa/Cwa</b>) are typically found on the eastern margins of continents between <b>latitudes 25° and 40°</b>. South Argentina (Patagonia) is situated at much higher latitudes and lies in the rain shadow of the Andes Mountains. As a result, it primarily experiences</li> </ul>

		<p>arid, semi-arid, or cold temperate climates rather than humid subtropical conditions.</p> <ul style="list-style-type: none"> <li>• Coastal South Africa: Known as the "<b>Natal type</b>," the eastern coastal region (e.g., Durban) experiences a humid subtropical climate influenced by warm ocean currents.</li> <li>• <b>East coast of Australia:</b> Major coastal cities like Brisbane and Sydney fall within the humid subtropical zone, characterized by hot, humid summers and mild winters.</li> <li>• <b>South Japan:</b> This region is a classic example of the "China type" humid subtropical climate, receiving significant rainfall throughout the year.</li> </ul>
95.	B	<p>Ans: 95 - (b) 2 only.</p> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>• <b>Statement 2 is correct:</b> Mission LiFE (Lifestyle for Environment) aims to create and nurture a global network of individuals known as 'Pro-Planet People' (P3). These individuals are recognized for their shared commitment to adopting and promoting environmentally friendly behaviors and lifestyles.</li> <li>• <b>Statement 1 is incorrect:</b> Mission LiFE does not envision promoting consumerism. On the contrary, it aims to replace the "use-and-dispose" economy—characterized by mindless and destructive consumption—with a circular economy defined by mindful and deliberate utilization of resources. Its core philosophy is to pull the world away from consumerist approaches toward sustainable consumption patterns.</li> </ul>
96.	A	<p>Sol: 96 - (a)</p>

		<ul style="list-style-type: none"> <li>India signed Based on the information regarding the National Mission on Sustainable Habitat (NMSH):</li> <li>Statement 1 is correct: The NMSH aims at promoting low-carbon urban growth, enhancing energy efficiency in buildings, improving management of solid and liquid waste, and shifting to public transport to reduce GHG emission intensity and achieve India's Nationally Determined Contribution (NDC).</li> <li>Statement 2 is incorrect: While India aims to reduce the emission intensity of its GDP by 33-35% by 2030 (not 2035) from 2005 levels, this is a broad national target under India's NDC, not specifically the aim (which is a component of, not the sole purpose) of the NMSH.</li> </ul>
97.	A	<p>Ans: 97 - (a)</p> <p>The correct answer is (a) If a substance loses hydrogen during reaction, it is reduced.</p> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>In classical chemistry, oxidation and reduction are defined based on the gain or loss of oxygen and hydrogen:</li> <li>Oxidation is the gain of oxygen or the loss of hydrogen.</li> <li>Reduction is the loss of oxygen or the gain of hydrogen.</li> <li>Statement (a) is incorrect because the loss of hydrogen is a characteristic of oxidation, not reduction.</li> </ul>
98.	A	<p>Sol: 98 - (a)</p>

		<ul style="list-style-type: none"> <li>The correct answer is 1 only.</li> </ul> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li><b>Statement 1 is correct:</b> Sleet is defined as precipitation consisting of frozen raindrops or refrozen melted snow-water. It forms when snowflakes melt into raindrops while passing through a warm layer and then refreeze into small, translucent ice pellets before hitting the ground.</li> <li><b>Statement 2 is incorrect:</b> For sleet to form, a warm layer of air must overlie a subfreezing (cold) layer near the ground. The raindrops must fall through a deep enough layer of freezing air at the surface to have time to turn into ice pellets. The statement incorrectly reverses this atmospheric profile by suggesting the freezing layer is above the warm layer near the surface.</li> </ul>
99.	B	<p>Sol: 99 - (b)</p> <p>The correct option is (b) Adi Granth Sahib.</p> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>Guru Arjan Dev, the fifth Sikh Guru, compiled the first official edition of the Sikh scripture in 1604 AD. This original volume is known as the Adi Granth (literally meaning "First Scripture" or "First Volume"). He collected the hymns of the first four Sikh Gurus along with his own compositions and those of various Hindu and Muslim saints (Bhagats), such as Kabir and Baba Farid. The scripture was then installed in the Harmandir Sahib (Golden Temple) in Amritsar.</li> </ul>
100.	A	<p>Ans: 100-(a)</p>

		<p>The correct answer is (a) Dhundiraj Govind Phalke.</p> <ul style="list-style-type: none"><li>Dhundiraj Govind Phalke, popularly known as Dadasaheb Phalke, produced and directed India's first full-length feature film, Raja Harishchandra, which was released in 1913. He is widely revered as the "Father of Indian Cinema" for this pioneering achievement.</li></ul>
101.	C	<p><b>Ans: 101 - (c)</b></p> <ul style="list-style-type: none"><li>The correct answer is (c) 2 and 3 only.</li></ul> <p>Based on historical and literary evidence, let's analyze the statements:</p> <ul style="list-style-type: none"><li>There is no reference to betel leaf in Charak Samhita and Sushruta Samhita: This is incorrect. Betel leaf (Tambula) is mentioned in Ayurvedic texts like Charaka Samhita and Sushruta Samhita, where it is described for its medicinal properties and as part of a healthy daily routine.</li><li>Kalidasa's Raghuvamsha associates the practice of betel leaf chewing with South India: This is correct. In Raghuvamsha (Canto IV), Kalidasa describes Raghu's victory march, where the betel chewing habit (using betel leaves on areca nut palms) is associated with the coastal areas of South India (Kerala/Malabar region).</li><li>Pattupattu mentions fields of areca plants: This is correct. The Pattupattu (Ten Tamil Idylls) from the Sangam literature mentions fields of areca plants and the practice of betel chewing, reflecting its presence in ancient Tamilakam.</li><li>Therefore, statements 2 and 3 are correct.</li></ul>

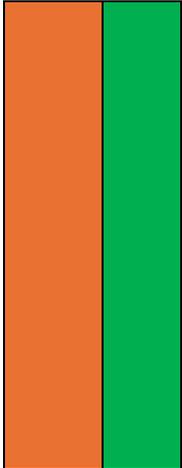
<b>102.</b>	<b>C</b>	<p>Ans: 102 - (c)</p> <p>The correct matching for the categories of land mentioned in Chola inscriptions is:              A-3, B-2, C-4, D-1</p> <p><b>Explanation</b></p> <p>According to Chola inscriptions, land was categorized based on its recipient and purpose:</p> <p style="padding-left: 40px;">Shalabhoga matches with 3. Land for the maintenance of a school.              Pallichchandam matches with 2. Land donated to Jain Institutions.              Vellanvagai matches with 4. Land of non-Brahmana peasant proprietors.              Tirunamattukkani matches with 1. Land gifted to temples.</p>
<b>103.</b>	<b>D</b>	<p>Ans: 103 - (d) 1, 2 and 3.</p> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>• The temperate forests of South India, locally known as "Sholas", are unique montane evergreen forests found in the high-altitude regions (typically above 1,500–1,600 meters) of the Western Ghats. They exist as patches of stunted trees tucked into sheltered valleys and hollows, interspersed with vast rolling grasslands, creating a distinctive mosaic landscape. These forests are primarily distributed across the following hill ranges:</li> </ul>

		<ul style="list-style-type: none"> <li>• Anaimalai Hills: Located south of the Nilgiris, these hills host the highest peak in South India (Anamudi) and contain extensive Shola-grassland ecosystems.</li> <li>• Nilgiri Hills: Known as the "Blue Mountains," this range is the most famous location for Sholas and is the meeting point of the Eastern and Western Ghats.</li> <li>• Palani Hills: An eastward extension of the Western Ghats, these hills (where Kodaikanal is located) are also home to significant patches of Shola forests.</li> <li>• Because the Shola-grassland complex is a signature feature of the entire southern montane block of the Western Ghats, it is found in all three of the specified hill ranges.</li> </ul>
<b>104.</b>	<b>D</b>	<p>Ans: 104 - (d) Moran.</p> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>• Moran (also known as Moran-Hugrijan) is a major oil field located in the Upper Assam Basin in the state of Assam, not Gujarat. Discovered in 1953, it is situated in the Brahmaputra Valley and is managed by Oil India Limited.</li> </ul>
<b>105.</b>	<b>D</b>	<p>Ans: 105 - (d)</p> <ul style="list-style-type: none"> <li>• As per the Land Revenue Records, any land is categorized as Culturable Waste-Land if it is left fallow (uncultivated) for more than (d) 5 years. This classification includes land that is capable of being cultivated but has been left uncultivated for a prolonged period, often covered in shrubbery.</li> </ul>

		<p><b>Key Definitions:</b></p> <ul style="list-style-type: none"> <li>• Culturable Waste-Land: Fallow for &gt; 5 years.</li> <li>• Fallow other than Current Fallow: Fallow for 1–5 years.</li> <li>• Current Fallow: Fallow for 1 year or less.</li> </ul>
106.	A	<p>Ans: 106 - (c)</p> <ul style="list-style-type: none"> <li>• <b>Statement 1 is correct</b> as ocean surface circulation is dominated by five major subtropical gyres driven by global surface wind patterns, specifically the trade winds and westerlies. These gyres are formed by the frictional drag of pers</li> <li>• The correct option is (c) 1, 3 and 4.</li> <li>• Explanation</li> <li>• Statement 1 is correct: Lakshadweep is the smallest Union Territory of India by area (approx. 32 sq km) and is an archipelago entirely composed of coral islands, atolls, and reefs.</li> <li>• Statement 3 is correct: The primary livelihoods of the people in Lakshadweep are fishing, coconut cultivation, and coir twisting (the production of fiber from coconut husks).</li> <li>• Statement 4 is correct: Lakshadweep has been declared India's first Union Territory to become 100% organic. All agricultural produce from the islands, particularly its coconuts, is grown without synthetic chemicals and is branded as an organic product.</li> <li>•</li> <li>• Statement 2 is incorrect: While Lakshadweep does consist of 36 islands, only 10 (or 11) islands are inhabited, not 6. The inhabited islands are Agatti,</li> </ul>

		Amini, Andrott, Bitra, Chetlat, Kadmat, Kalpeni, Kavaratti, Kiltan, and Minicoy.
107.	C	<p><b>Ans: 107- (b)</b></p> <p>The correct option is (b) Bokaro Steel Plant.</p> <ul style="list-style-type: none"> <li>• The Bokaro Steel Plant, located in Jharkhand, uniquely satisfies all three criteria mentioned:</li> <li>• Russian Collaboration: It was established in 1964 with technical and financial assistance from the Soviet Union (Russia).</li> <li>• Iron Ore Source: It strategically receives iron ore from the Rourkela-Barsua region.</li> <li>• Power and Water: It is situated in the Damodar River basin and receives its water and hydel power supply from the Damodar Valley Corporation (DVC).</li> </ul>
108.	C	<p><b>Ans: 108 - (a)</b></p> <p>The correct option is (a) Kandla Port.</p> <ul style="list-style-type: none"> <li>• The offshore terminal at Vadinar was specifically developed to reduce the operational pressure on Kandla Port (now known as Deendayal Port).</li> <li>• Explanation</li> <li>• Purpose &amp; Infrastructure: Due to its high volume of crude oil and fertilizer traffic, Kandla Port necessitated an additional facility to handle Very Large Crude Carriers (VLCCs). The Vadinar terminal, located in the Gulf of Kutch, features Single Point Mooring (SPM) systems to facilitate this, relieving congestion by allowing large vessels to offload directly to pipelines.</li> </ul>
109.	B	Ans: 109 - (b)

		<p>The correct option is (b) Coffee.</p> <ul style="list-style-type: none"> <li>The National Food Security Mission - Commercial Crops (NFSM-CC) specifically targets a select group of commercial crops to enhance productivity and support related industries. While coffee is a major commercial and plantation crop in India, it is managed by the Coffee Board of India and does not fall under the mandate of the NFSM.</li> </ul> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>NFSM-CC Scope: The National Food Security Mission (NFSM) was expanded in 2014-15 to include a component for commercial crops (NFSM-CC).</li> <li>Included Crops: The specific crops covered under this mission are Cotton, Jute, and Sugarcane.</li> <li>Objectives: The mission aims to increase the production and productivity of these crops through demonstrations of improved technology and distribution of high-yielding seeds to support the textile and sugar sectors.</li> </ul>
<b>110.</b>	<b>B</b>	<p>Ans: 110 - (b)</p> <p>The correct answer is (b) Tropical Thorn Forests.</p> <p><b>Explanation</b></p> <ul style="list-style-type: none"> <li>Tussocky grass is a characteristic feature of the undergrowth in Tropical Thorn Forests in India.</li> <li>Definition: Tussocky grass refers to perennial grasses that grow in distinct clumps or tufts rather than as a continuous sod.</li> </ul>



- **Adaptation:** These grasses are highly drought-resistant and adapted to the arid and semi-arid environments where rainfall is typically less than 50–70 cm annually.
- **Height:** In these forests, tussocky grass can reach heights of up to 2 meters.
- **Location:** They are commonly found in the semi-arid regions of southwest Punjab, Haryana, Rajasthan, Gujarat, Madhya Pradesh, and the Deccan Plateau.

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