

HINTS & SOLUTION

1. (d) Sun is the star nearest to the earth. It is 150 million kilo meter away from earth. Sun has temperatures of over 15 million degree centigrade.
2. (a) Venus has the longest day because it takes about 243 Earth days to complete one rotation. Jupiter has the highest number of moons (confirmed at over 90). Mercury does have a very thin exosphere (not a true atmosphere).
3. (d) The ice crystals suspended in cirrus clouds (5-10 k.m.) in the upper atmosphere are responsible for sun's halo.
4. (b) Thermohaline circulation is driven by differences in temperature (thermo) and salinity (haline) in ocean waters.
5. (b) The Exosphere is the outermost layer with extremely low air density. It does not contain ozone; the ozone layer is in the Stratosphere. Satellites orbit the Earth in the Exosphere.
6. (a) The Sargasso Sea has no coastline and is rich in seaweed. The Arabian Sea is heavily influenced by the monsoon. The Baltic Sea has low salinity and freezing conditions. The Bering Sea lies between Alaska and Russia.
7. (a) The surface wind spiral inwards the centre of the cyclone, which create a low pressure area in the centre.
8. (b) The asteroid belt lies between Mars and Jupiter. It is composed primarily of rocky and metallic objects, not ice and methane. Ceres is classified as a dwarf planet within the asteroid belt.
9. (c) The Mid-Atlantic Ridge is an oceanic ridge formed by divergent tectonic plates.
10. (a) Trade winds blow from subtropical high-pressure belts (30°N/S) to the equatorial low-pressure zone (ITCZ). Westerlies blow from subtropical high-pressure zones to subpolar low-pressure zones. Polar easterlies blow from poles to subpolar regions. Monsoons are seasonal winds, not planetary.
11. (b) The westerlies in the southern hemisphere is called as roaring forties; lies between 40°S to 50°S and is a permanent wind. It is slow over landmass.
12. (a) Composite volcano (Strato-volcano) is a volcanic cone built of alternating layers of Lava and Pyroclastic materials, over a lengthy time period.

13. (d) South Asia comprises the sub-Himalayan countries. According to the United Nations geographical region classification, the current territories are Afghanistan, Bangladesh, Bhutan, India, Maldives, Nepal, Pakistan and Sri Lanka.
14. (c) Solar noon occurs at the same time for places on the same longitude.
15. (b) When arranged from north to south based on their latitudinal location: Chotanagpur Plateau (2) → Malwa Plateau (1) → Deccan Plateau (3) → Karnataka Plateau (4).
16. (a) On the equator, the day and night stay approximately the same length all year round.
17. (b) Water effectively bounces off the outer bank as it turns exerting an extra pressure on the bank. This is why the river bank is weakest where the river turns..
18. (c) The International Date Line is an imaginary line of longitude on the Earth's surface located at about 180 degrees east (or west) of the Greenwich Meridian.
19. (a) If the object does not reflect any colour, it appears black. The tiny droplets of water in rain clouds scatter the white light of the sun. Red is scattered first, and violet the last. This happens at such a high altitude that no rays of the sun reach the bottom of the cloud. Thus, we do not see the rays of the sun and this results in a dark effect.
20. (b) Fold Mountains form when two tectonic plates move together (a convergent plate boundary). Fold Mountains form from sedimentary rocks that accumulate along the margins of continents.
21. (d) Mid-latitude or frontal cyclones are large travelling atmospheric cyclonic storms up to 2000 kilometres in diameter with centres of low atmospheric pressure. The jet stream plays a major role in the location of mid-latitude cyclones..
22. (d) The eastern and western boundaries of the Pacific Ocean experience frequent earthquake because High mountain stretch along the continental margins adjacent to this ocean.
23. (a) El Nino is a warm ocean current. The term El Nino refers to the large-scale ocean atmosphere climate interaction linked to a periodic warming in sea surface temperatures across the central and east-central Equatorial Pacific.
24. (b) The axis of the Earth's magnetic field is not inclined at 23.5° to the geographic axis. This angle refers to the Earth's axial tilt relative to its orbit (obliquity). Instead, the Earth's magnetic axis is inclined at

- approximately 11.5° to the geographic axis.
25. (b) Turkey's smaller part is in South eastern Europe and its larger part in Western Asia which is located between Black Sea and Mediterranean.
26. (a) The Tapi (Tapti) River does not lie to the south of the Satpura Range. Instead, it flows between the Satpura and Ajanta ranges, lying to the north of Satpura. This makes the statement factually incorrect.
27. (b) Statement 1 is incorrect as the Teesta River originates from the Pahunri Glacier, not the same source as the Brahmaputra. Statement 2 is correct because the River Rangeet, Sikkim's largest river, originates in Sikkim and is a tributary of the Teesta River. Statement 3 is also incorrect since the Teesta flows through Sikkim and West Bengal before entering Bangladesh and joining the Brahmaputra as a left tributary, not a right one.
28. (d) The Karakoram Range is part of the greater Hindu Kush Himalayan (HKH) mountain system, which stretches across multiple countries, including India, Pakistan, and Afghanistan. Leh, located in Ladakh, is part of India's cold desert region and lies in proximity to the Karakoram Range, which dominates the northern part of the region. The Biafo Glacier, one of the largest glaciers outside the polar regions, is located in the Karakoram Range, specifically in the Gilgit-Baltistan region of Pakistan.
29. (b) The correct sequence of the rivers in India from north towards south is Shyok – Zaskar – Spiti – Satluj. Shyok flows through northern Ladakh in India. Zaskar river flows in north-eastern part of Ladakh. Spiti river is situated at Kaza in Himachal Pradesh at an elevation of 12500 feet. Satluj river rise from slopes of Kailash and flows in south-westerly direction to Himachal Pradesh & Punjab.
30. (a) Rabi crops are sown in October-November (after the monsoon) and harvested in March-April. Examples include wheat, mustard, and barley.
31. (a) Marble is a metamorphic rock formed when limestone is subjected to high pressure and temperature.
32. (b) Heavy water (D_2O) is used in nuclear reactor as a moderator. The deuterium is an isotope of hydrogen. Its atomic mass is 2. Hence its molecular weight is $20u (2 + 18)$.
33. (b) Ionisation potential increases across a period due to decreasing atomic size and stronger nuclear attraction, making it harder to remove electrons, so Statement 1 is incorrect. Electronegativity also increases across a period for similar reasons, making

Statement 3 incorrect. However, as we move down a group, electron affinity decreases because the atomic size increases, reducing the attraction between the nucleus and additional electrons, even though atomic weight increases. Thus, only Statement 2 is correct.

34. (d) Nitroglycerine is a highly explosive compound widely used in making dynamite and other explosives. It is sensitive to heat, shock, and friction, making it dangerous but effective in controlled demolitions and as a propellant. Phosphorus trichloride is a chemical used in synthesis, not as an explosive. Mercuric oxide is a toxic compound, primarily used in laboratories. Graphite is a stable form of carbon, used in pencils and as a lubricant, not as an explosive.
35. (b) Carbon Monoxide pollution occurs primarily from emissions produced by fossil fuel powered engines. The incomplete reaction of air with fuel produces the colourless, odourless and highly toxic gas. The main issue with Carbon Monoxide is its health effects. It is capable of binding to the chemicals in our blood, called haemoglobin. It does so far more effectively than oxygen and also stays bound to the haemoglobin for far longer than oxygen does. The effect is that the blood is starved of oxygen, which then affects the rest of the body.
36. (a) The oxidation number characterises the oxidation state of an element in a compound. It is a full number, positive or negative, which indicates the amount of electron loss or gain by this element in the given compound, with respect to the neutral atom. Oxidation number of calcium is 2 in calcium oxide (CaO). Oxidation number of Aluminium is +3 in Sodium aluminium hydride (NaAlH₄) is a chemical compound used as a reducing agent. Oxidation number of manganese is 4 in Manganese dioxide (MnO₂). Oxidation number of sulphur is 6 in Pyrosulfuric Acid (H₂S₂O₇).
37. (a) In the extraction of iron in a blast furnace, silica (SiO₂) acts as an acidic impurity. To remove this impurity, limestone (CaCO₃) is added, which decomposes into calcium oxide (CaO). The calcium oxide reacts with silica to form calcium silicate (CaSiO₃), a slag that can be easily removed..
38. (b) At 25°C, a neutral solution has equal concentrations of hydrogen ions (H⁺) and hydroxide ions (OH⁻), which is 10⁻⁷ mol/L. The pH is calculated as $\text{pH} = -\log[\text{H}^+] = -\log(10^{-7}) = 7$
39. (a) Aqua-regia is a mixture of concentrated nitric acid and concentrated hydrochloric acid in the ratio 1 : 3 respectively. It is a very powerful oxidising mixture.

40. (c) A chemical change a new substance is formed. During crystallisation of table salt from sea water no new substance is formed hence, it is not a chemical change.
41. (b) According to article 82 of Indian Constitution, the parliament of India shall readjust the allocation of seats in the Lok Sabha to the states and division of each state into territorial constituencies..
42. (a) Article 65 of the Indian Constitution says that while acting as president or discharging the functions of president, the Vice President does not perform the duties of the office of the chairman of Rajya sabha. Article 123 of the Constitution grants the President certain law making powers to promulgate Ordinances when either of the two Houses of Parliament is not in session and hence it is not possible to enact laws in the Parliament.
43. (d) Fourth schedule allocates seats in the Council of States i.e. Rajya Sabha..
44. (d) As Indian follows Universal Adult Suffrage elected members of the Lower House of the State Legislature i. e., Las have the right to vote in the elections to both the Lok Sabha and Rajya Sabha. The State Legislature besides making laws also has one electoral power in electing the President of India. Elected members of the Legislative Assembly along with the elected members of Parliament are involved in this process.
45. (c) Decorum means maintaining proper behaviour. Interpellation means formal right of a Parliament to submit formal question to the government. Crossing the floor means to vote against the party lines. Yielding the floor means the speaker giving part of his or her speaking time to another speaker. While this practice is allowed in some legislative bodies, it is not allowed in deliberative assemblies, unless specifically authorized in the rules.
46. (d) As per provisions under Article 149, the Comptroller and Auditor General shall perform such duties and exercise such powers in relation to the accounts of the Union and of the States and of any other authority or body as may be prescribed by or under any law made by Parliament and, until provision in that behalf is so made, shall perform such duties and exercise such powers in relation to the accounts of the Union and of the States as were conferred on or exercisable by the Auditor General of India immediately before the commencement of this Constitution in relation to the accounts of the Dominion of India and of the Provinces respectively.
47. (b) Article 370 was included in Part XXI of the Indian Constitution, which deals with "Temporary, Transitional,

and Special Provisions." This part provided for special arrangements with respect to certain states, including Jammu and Kashmir, to address their unique political and historical circumstances at the time of their integration into India. Article 370 was labelled as a temporary provision, which was subject to change or revocation by the President, subject to certain conditions.

48. (b) The Constitution 98th Amendment Bill, 2003, seeks to constitute a National Judicial Commission (NJC) by including Chapter IV-A in Part V of the Constitution which will be in charge of appointing judges to the higher judiciary and for transferring High Court Judges.
49. (c) Ganesh Vasudev Mavalankar became the Speaker of the Provisional Parliament on 26 November 1949 and continued to occupy the office till the 1st Lok Sabha that was constituted in 1952.
50. (d) The Ministry of Home Affairs through a notification dated May 4, 2020, constituted a committee to review the three codes of criminal law. It was headed by Prof. (Dr.) Ranbir Singh, former Vice Chancellor of National Law University (NLU), Delhi.
51. (b) The Constitution of India empowering the Parliament to make laws in the State List and to create one or more All India Services.
52. (d) The Tenth Schedule (Anti-Defection Act) was included in the Constitution in 1985 by the Rajiv Gandhi ministry and sets the provisions for disqualification of elected members on the grounds of defection to another political party..
53. (d) The Commonwealth of Nations is an intergovernmental organisation of 53 member states that were mostly territories of the former British Empire. The membership only shows that the British ruled over India.
54. (c) The District Forum entertains the complaints where the value of goods or services does not exceed rupees twenty lakhs.
55. (c) Food and Nutrition Board works under Ministry of Women and Child Development. It is a technical support wing under Child Development Bureau of the Ministry.
56. (a) The Central Administrative Tribunal has been established for adjudication of disputes with respect to recruitment and conditions of service of persons appointed to public services and posts in connection with the affairs of the Union or other local authorities within the territory of India..

57. (d) A lieutenant Governor is in charge of a Union Territory whereas a Governor is in charge of a State. The rank of Lt.Governor is present only in the states of Delhi, Andaman and Nicobar Islands and Puducherry. So in the case of a Union Territory specified where there is a legislative setup, the Chief Minister is appointed by the Lieutenant Governor.
58. (b) The Directive Principles resemble the instrument of instructions enumerated in the "government of India Act of 1935.
59. (c) The Constitution empowers Parliament of India to make laws on the matters reserved for States (States List). However, this can only be done if Rajya Sabha first passes a resolution by two-thirds supermajority granting such a power to the Union Parliament. The union government cannot make a law on a matter reserved for states without an authorisation from Rajya Sabha. So the House of People does not have special powers with respect to the state list.
60. (c) The constitution of 1950 distinguished between three main types of states: The Part A states were ruled by an elected governor and state legislature. The Part B states were governed by a rajpramukh. The Part C states were governed by a chief commissioner appointed by the President of India. The Part D states were administered by a lieutenant governor appointed by the central government.
61. (d) PESA Act does not identify the freedom of tribal people from exploitation as its objectives, but it automatically becomes a byproduct of its objectives.
62. (d) Article 25 says everyone has the right to a standard of living adequate for the health and well- being of himself and of his family, including food, clothing, housing and medical care and necessary social services, and the right to security in the event of unemployment, sickness, disability, widowhood, old age or other lack of livelihood in circumstances beyond his control. Article 21(2) says– everyone has the right of equal access to public service in his country. Article 26(1) says–Everyone has the right to education. Education shall be free, at least in the elementary and fundamental stages..
63. (c) Fog consists of tiny water droplets suspended in the air. When light passes through fog, these droplets scatter the light in all directions due to their small size (a phenomenon known as Mie scattering). This scattering reduces the intensity of light reaching the observer and creates a diffused effect, making it difficult to see clearly through the fog.

64. (a) Curvature of the earth does not allow the television signals to be received beyond a particular distance.
65. (b) If the Earth's radius shrinks by 1% while its mass remains the same, the force of gravity on its surface (g) will increase. This happens because gravity depends on how close you are to the center of the Earth. When the radius becomes smaller, you are closer to the Earth's center, which increases the gravitational pull. Since the change in radius is small, the increase in gravity is approximately proportional to the square of the decrease in radius. A 1% decrease in radius results in about a 2% increase in the value of g . Thus, the acceleration due to gravity would increase by 2%.
66. (b) Both statement 1 and statement 2 are correct. On heating up to same temperature copper piece is found hotter than in comparison to glass piece because copper being a metal is a good conductor of heat and electricity while glass on the other hand is a poor conductor of heat. The density of copper is 8.92 gm/cm^3 and of glass is 2.6 gm/cm^3 .
67. (a) Surface tension is a property of liquids that causes their surfaces to act like a stretched elastic sheet due to cohesive forces between liquid molecules. This property leads to phenomena such as the convex shape of a liquid meniscus, the rise of liquids in capillaries, and the spherical shape of mercury drops, all of which aim to minimize the surface area of the liquid. However, vapour formation above a liquid surface is not a result of surface tension. It occurs due to evaporation, which depends on the temperature and energy of the liquid molecules, not on the cohesive forces responsible for surface tension.
68. (c) The Law of Conservation of Energy states that energy cannot be created or destroyed in an isolated system. It can only change from one form to another, such as kinetic energy converting into potential energy, but the total energy remains constant.
69. (c) Faraday's Law of Electromagnetic Induction explains how a changing magnetic field induces an electromotive force (EMF) or current in a conductor. It is the fundamental principle behind transformers, electric generators, and inductors.
70. (b) An isochoric process occurs at constant volume, meaning no work is done by the system. Any heat added increases the internal energy of the system.
71. (d) Resistance of a conductor depends on its length, cross-sectional area, and the material's resistivity, but it is independent of the magnetic field.

72. (a) 1 Kilowatt hour (kWh) is the amount of energy used by a 1 kW device running for 1 hour. To convert kilowatt hours to joules, we use the conversion factor: $1 \text{ kWh} = 1 \text{ kW} \times 1 \text{ hour} \rightarrow 1000 \text{ W} \times 3600 \text{ seconds} = 3,600,000 \text{ Joules} \rightarrow 3.6 \text{ Mega Joules}$.
73. (b) Fleming's Right-Hand Rule determines the direction of induced current, where the thumb indicates motion, the forefinger indicates the magnetic field, and the middle finger indicates the direction of the induced current.
74. (b) Placing a magnetic material (like iron) inside a solenoid enhances the magnetic field because the material becomes magnetized, aligning its domains with the solenoid's field.
75. (d) Shadow entrepreneurs are individuals who manage a business that sells legitimate goods and services but they do not register their businesses. This means that they do not pay tax, operating in a shadow economy where business activities are performed outside the reach of government authorities. Types of businesses include unlicensed taxicab services, roadside food stalls and small landscaping operations. In a study of 68 countries, the Imperial College Business School found that after Indonesia, India has the second highest rate of shadow entrepreneurs..
76. (c) In V-shaped the incomes and jobs are permanently lost, and the economic growth recovers gradually. This is typically characterized by a sharp decline in economic activity followed by a swift and strong recovery. In a V-shaped recovery, incomes and jobs are not permanently lost. The economy bounces back relatively quickly after the downturn.
77. (a) The Digital Payments Index (DPI) is published by the Reserve Bank of India (RBI). The DPI measures the extent of digitization of payments across India, and it reflects the adoption and spread of digital payments in the country.
78. (c) Statement 3 is incorrect. While ARC's are crucial for the resolution of NPAs, they do not require equity contributions from the government. ARC's are primarily set up by private sector banks, financial institutions, or other entities, and their funding is through private investment. The government may regulate the sector but does not typically provide equity funding for these companies.
79. (b) The term "Ombudsman" is of Swedish origin, where it was first introduced in the early 19th century. The word "ombudsman" means "representative" or "agent" in Swedish. In Sweden, the Ombudsman was created as an independent official to investigate complaints of

maladministration or abuse of power within the government. Over time, the concept spread to other countries and is now widely used in various nations to refer to an official who acts as an intermediary between the government and the public to address grievances and ensure fairness.

- 80.** (d) Statement 1 is incorrect. In a Limited Liability Partnership (LLP), each partner's liability is limited to the amount they have invested in the business. They are not responsible or liable for the misconduct or negligence of other partners, unlike in a traditional partnership. Statement 2 is incorrect. In a partnership firm, every partner is jointly and severally liable for all acts of the firm done during the period they are partners. This means that each partner is individually liable for the entire debt or obligation of the firm, even if they were not directly involved in the act.
- 81.** (c) The Goods and Services Tax (GST) is based on the principle of destination-based consumption taxation. This means that the tax is collected at the place where goods or services are consumed, not at the place where they are produced. Statement 2 is incorrect. The GST rates are not solely decided by the Union Government. They are determined by the GST Council, which comprises the Union Finance Minister (as the Chairperson), the Union

Minister of State for Revenue, and state finance ministers.

- 82.** (b) Procurement price is the support price at which the government will buy whatever quantum farmers want to sell to the government in the event of private traders not buying the product. This is done to give a fair price to the farmer and to create a buffer stock of food grains to meet public distribution system requirements.
- 83.** (a) CPS in India are Real Time Gross Settlement (RTGS) and National Electronic Funds Transfer (NEFT) systems, both owned and operated by the Reserve Bank. RTGS: It enables real-time transfer of funds to a beneficiary's account and is primarily meant for large-value transactions.
- 84.** (d) The Food Waste Index Report is released by the United Nations Environment Programme (UNEP). This report assesses the extent of global food waste and provides insights into how food waste impacts the environment, economy, and society.
- 85.** (a) India is indeed a founding member of the Asian Development Bank (ADB), which was established in 1966 to foster economic growth and cooperation in Asia and the Pacific. However, while India is a significant shareholder, the largest share is held by Japan, followed by the United States.

- The ADB is headquartered in Manila, Philippines, not Thailand. This makes Statement 1 correct, while Statements 2 and 3 are incorrect.
- 86.** (c) PAN will be used as common identifier for all digital systems of specified government agencies.
- 87.** (b) The Central Drug Research Institute (CDRI) is a multidisciplinary research laboratory in Lucknow, Uttar Pradesh that employs scientific personnel from various areas of biomedical sciences.
- 88.** (b) The 2024 G20 Rio de Janeiro summit was the nineteenth meeting of Group of Twenty (G20), a Heads of State and Government meeting held at the Museum of Modern Art in Rio de Janeiro from 18–19 November 2024.
- 89.** (a) Russia's Defence Ministry reported that Ukraine fired six US-made Army Tactical Missile System (ATACMS) at Russia's Bryansk region. ATACMS is a surface-to-surface artillery weapon system. It is manufactured by Lockheed Martin, US defence company. It is capable of striking targets beyond the range of standard artillery and was first used in the 1991 Gulf War.
- 90.** (b) The NCC operates under the Ministry of Defence, with the Defence Secretary overseeing its administration.
- 91.** (d) The Brihadeeswara Temple, constructed by the Chola king Raja Raja Chola I, is a prominent example of Dravidian temple architecture. It features large pyramidal towers (vimanas) and intricate sculptures.
- 92.** (d) Prime Minister Narendra Modi has been with the 'The Order of Excellence' in Guyana during the final leg of his three-nation tour following the G20 Summit in Brazil. Guyanese President Mohamed Irfaan Ali conferred the country's highest honour on PM Modi for his exceptional service to the global community, statesmanship and contribution to deepening the India-Guyana ties. He became first Indian PM to visit Guyana in 56 years.
- 93.** (c) The 'One Nation One Subscription' scheme aims to unify journal access. It will benefit over 6,300 institutions, promoting research across diverse academic fields in India. INFLIBNET will manage all central payments to publishers. Institutions may still use their own funds for additional subscriptions outside the ONOS scheme. This flexibility allows for tailored access to specific journals. The ONOS platform will become operational on January 1, 2025
- 94.** (a) The Meenakshi Temple in Madurai, Tamil Nadu, is dedicated to Goddess

Meenakshi (Parvati) and Lord Sundaeswarar (Shiva).

95. (a) Deuce is associated with Tennis, not Football.
96. (a) In bisexual flower, the production of male and female flower (androecium and gynoecium) mature at different times to avoid self-fertilization. That is called dichogamy.
97. (b) Spirogyra and Ulothrix are green algae not blue algae. The chameleon can see in both the direction forward and backward at the same time.
98. (a) Thyroxine hormone and tri-iodothyronine hormone are secreted by thyroid follicular cells of thyroid gland. The major component of thyroxine hormone is iodine.
99. (c) Coronary arteries supply blood to heart. Carotid arteries supply the blood to head region. Hepatic arteries supply to liver and pulmonary arteries supplies blood to the lungs.
100. (a) Fat present below the skin surface in our body, act as a insulator against loss of heat from the body.
101. (d) Polyunsaturated fatty acid is an anti oxidant, which helps in building of tissues.
102. (c) According to evolution of living organisms Salamander-Python-Kangaroo, because the evolution started from amphibians 350 million years ago, reptiles appeared 300 million years ago and 200 million years ago first small mammals appeared.
103. (c) Photosynthesis occurs between wavelengths of about 400 nm and 750 nm. Red and blue colour wavelength is categories in this wavelength. So, plants absorb these colours. Photosynthesis does not occur in the infra-red or in ultraviolet light..
104. (d) Colour vision in the human eye is enabled by cones, which are photoreceptor cells located in the retina. There are three types of cones, each sensitive to different wavelengths of light: red, green, and blue. These cones work together to allow us to perceive a wide spectrum of colours.
105. (b) Fermentation is a biochemical process in which organic compounds, such as sugars, are broken down into simpler substances by the action of enzymes. These enzymes are produced by microorganisms like yeast, bacteria, or fungi.
106. (a) Plant and animal cells share several similarities but also have distinct differences. A key distinction is that plant cells contain chloroplasts, which are organelles responsible for photosynthesis, enabling plants to produce their own food. Animal cells

- lack chloroplasts since they do not perform photosynthesis. Additionally, while both types of cells contain a nucleus that regulates cellular activities, plant cells also have unique features such as a rigid cell wall and a large central vacuole, which are absent in animal cells. The size difference mentioned in some cases is not consistent, as both plant and animal cells can vary in size based on their type and function. Thus, the most notable difference lies in the presence of chloroplasts in plant cells, which animal cells do not possess.
- 107.** (d) The words Satyameva Jayate came from Mundaka Upanishad, meaning 'Truth Alone Triumphs'.
- 108.** (a) The pose 'Tribhanga' is the favourite posture of Lord Krishna. We have often seen Lord Krishna standing in tribhanga posture before his cow 'Kamdhenu' or whenever he is playing his flute. He is often called Tribhanga Murari.
- 109.** (a) We have read about the Mehrgarh cotton which is the earliest example of Cotton cultivation in the old world, older than the Peruvians. The cloth was made, and even dyed, so statement 2 is correct. The first statement is also correct and has been "lifted" from a famous history book.
- 110.** (d) It was written by Samudragupta's court poet Harisena.
- 111.** (c) Jainism spread in South India under the leadership of Bhadrabahu (not Sthalabahu). The Jainas who remained under the leadership of Bhadrabahu were called Digambaras (not Shvetambaras) after the first council held at Pataliputra (modern Patna) by Sthulbahu.
- 112.** (a) This is same as the Pythagoras theorem.
- 113.** (b) Painted Greyware belonged to later Vedic period (1000–600BC). Ajanta paintings belong to the Gupta period. Pahari School came into existence during the Mughal period.
- 114.** (d) It was constituted by Shivaji in Maratha administration.
- 115.** (b) Amir Khusrau refers to the discovery of America.
- 116.** (d) Sheikh Ahmad Sarhandi of Naqshbandi order was a contemporary of Akbar and Jahangir. The Qadiri order of Sufis was first introduced in India by Sheikh Nizamattullah (He died in 1430 AD) and Makhdum (or Nasiruddin) Muhammad Jilani (died in 1517).
- 117.** (c) The battle of Dharmat was fought between Aurangzeb and Dara Shikoh in 1658 for Shahjahan's throne. Dara Shikoh was defeated by Aurangzeb..

- 118.** (d) Dadra and Nagar Haveli was under Portuguese colonial rule till 1954 and not French colonial rule.
- 119.** (b) Battle of Ambur-1749, Battle of Plassey-1757, Battle of Wandiwash-1760, Battle of Buxar-1764.
- 120.** (b) Battle of Wandiwash in 1760 and French were finally defeated by English. Battle of Buxar (1764) - English under Munro defeated Mir Qasim, Shuja-ud- daula and Shah Alam II.