

IASbaba's Daily Prelims Test [Day 43]

TOPIC: Ancient History & Culture; Environment; S&T and Current Affairs

1. Consider the following statements.

1. Grinding and polishing of stone tools.
2. Manufacture of pottery.
3. Mixed economy based on early farming and domestication of animals supplemented by hunting.

Which one among the following best describes above characteristics?

1. Paleolithic stage
2. Mesolithic stage
3. Neolithic stage
4. None of the above

Ans: (3)

Explanation:

Grinding and polishing of stone tools remain the most essential characteristics of a Neolithic culture; also the manufacturing of pottery.

Subsistence pattern of Neolithic culture is characterized by mixed economy based on early farming and domestication of animals supplemented by hunting.

2. Most Harappan towns had a remarkable unity of conception in "town planning". Which of the following is/are true regarding town planning?

1. Citadel was built on a high podium of mud brick located on the east side of the settlement.
2. Lower city contained residential area of the ruled and poor.

Select the correct code from below.

1. 1 only
2. 2 only
3. Both 1 and 2
4. Neither 1 nor 2

Ans: (2)

Explanation:

Most of the Harappan towns were divided into two parts. One is citadel located on the *western side* of the town. Other is lower city which contained residential area of the ruled and poor. But there were some exceptions. Lothal did not have any internal division into citadel and lower cities.

Citadel was surrounded by brick wall. In some cases both citadel and lower city were surrounded by wall as in Kalibangan. In Kot-Diji and Amri there were no fortifications of the city at all.

3. Match the following.

Harappan town	Associated structures
1. Mohenjo-Daro	i. Fire altars
2. Harappa	ii. Large tank
3. Kalibangan	iii. Great bath
4. Dholavira	iv. Series of granary

Select the correct code from below.

1. 1-ii, 2-iv, 3-i, 4-iii
2. 1-iv, 2-iii, 3-i, 4-ii
3. 1-ii, 2-i, 3-iv, 4-iii
4. 1-iii, 2-iv, 3-i, 4-ii

Ans: (4)

Explanation:

In the citadel of Harappa we find as many as six granaries. A series of bricks platforms formed the basis for two rows of six granaries. Each granary measures 15.23 X 6.09m. It is also called as "grate granary".

Also in Mohenjo-Daro we find a granary measuring 15.71m X 15.23m, which is the largest building in Mohenjo-Daro.

4. Consider the following statements regarding economy of Early Vedic period.

1. Cattle rearing were the dominant occupational activity.
2. Early Vedic people used Iron tools.
3. Early Vedic people practiced shifting agriculture.

Which of the above statement is/ are correct?

1. 1 and 3 only
2. 1 only
3. 1 and 2 only
4. All the above

Ans: (1)

Explanation:

Early Vedic people did not use iron technology. They were familiar with copper and also used stone tools. But copper did not have much value in agricultural operations like iron implements. Stone tools and copper find mention in Rigveda.

Fire was used to burn down forest cover and shifting agricultural practice.

5. Which of the following statement(s) is/are correct regarding 'Janapadas' and 'Mahajanapadas'?

1. Janapadas were essentially agricultural settlements and were essentially named after main kshatriya lineages in that area.
2. Some of the Janapadas were developed into Mahajanapadas in sixth century B.C.
3. Political setups of all Mahajanapadas were monarchical.

Select the correct code from below.

1. 1 only
2. 2 only
3. 1 and 2 only
4. All the above

Ans: (3)

Explanation:

Some of the Mahajanapadas were oligarchies (or 'Ganasanghas'). Eg: Mallas, Vajji.

6. Collection of Buddha's teachings (canons) divided into three sections. Which of the following is/are correct regarding Buddhist canons?

1. Sutta Pitaka contains rules of monastic discipline.
2. Vinaya Pitaka consists of religious discourse and saying of Buddha.
3. Jataka tales is part of Sutta Pitaka.

Select the correct code from below.

1. 1 and 2 only
2. 3 only
3. All the above
4. None of the above

Ans: (2)

Explanation: Vinaya Pitaka contains rules of monastic discipline. Sutta Pitaka consists of religious discourse and saying of Buddha.

Jataka tales is the 5th section of Sutta Pitaka.

7. Megasthenes has given a vivid description of Mauryan city administration. Which of the following are correct regarding Mauryan city administration?

1. City council was divided into six committees and each committee had five members.
2. There was a committee to look after foreigners.
3. Arthashastra also mentions these six committees.

Select the correct code from below.

1. 1 and 2 only
2. 2 and 3 only
3. 1 and 3 only
4. All the above

Ans: (1)

Explanation:

Six committees of five members each were for

1. Industries and crafts
2. To look after foreigners
3. Registration of birth and deaths
4. Trade and commerce
5. Manufactured goods
6. Collection of tax on goods sold

Arthashastra does not mention anything about these committees.

8. Early Sangam Tamil poems speak of five eco zones. In this context 'Mullai' refers to

1. Hill and forests
2. Pasture land with low hills and thin forests
3. Fertile agricultural plains
4. Sea coasts

Ans: (2)

Explanation:

Five eco zones mentioned are

1. 'Kurinji' - Hill and forests
2. 'Mullai' - Pasture land with low hills and thin forests
3. 'Marutam' - Fertile agricultural plains
4. 'Neytal' – sea coasts
5. 'Palai' – arid zones

9. Which of the following is/are the features of 'Megalithic Burials'?

1. Dead were buried with distinctive pots called Black and Red ware.
2. Burials sometimes yielded tools and weapons of iron.
3. Skeleton of horses, horse equipments are found at megalithic burials.

Select the correct code from below.

1. 1 and 2 only
2. 1 and 3 only
3. 2 and 3 only
4. All the above

Ans: (4)

Explanation:

All the three are the common features of Megalithic Burials.

10. Consider the following statements regarding Gupta administration.

1. Highest unit of territorial division of the country was called 'Bhukti'.
2. Justice was based on Varna classification.

Which of the above statements is/are correct?

1. 1 only
2. 2 only
3. Both 1 and 2
4. Neither 1 nor 2

Ans: (3)

Explanation:

Bhukti was the highest unit of territorial division of the country which was kept under the charge of Uparika or sometimes under princes.

During this period many law codes and treatises were compiled and dharmashastras elaborately dealt with legal matters. These advocated Justice based on Varna classification.

11. Below are the characteristics of Drought Resistance Crops/Plants.

1. Transpiration is high to maintain the equilibrium of heat and water
2. Decreased Photosynthetic efficiency
3. Water uptake is low
4. Leaf surface is increased for better photosynthesis

Correct code/s

1. 1, 3 and 4
2. 1, 2, 3 and 4
3. 2 and 3
4. None

Solution- 4

Transpiration is low to maintain water loss. The plant species using the pathways have a high rate of carbohydrate assimilation for given stomatal opening higher temperature & light optimum.

The water uptake by plants is increased efficiently due to following plant characteristics.

Efficient root system:

- i) Extensive root system
- ii) Deeper root system
- iii) Secondary root etc.
- iv) Ability of roots to go towards available water
- v) Ability of roots to penetrate in soil

Rolling or curling of the leaves reduces the leaf surface exposed to sunlight thus helps in reducing the transpiration loss under stress conditions.

12. A tipping point is a critical threshold at which a small change in human activity can have large and long term consequences on Earth's Climate system. What the 'Tipping Elements' are as pointed out by scientists in this regard?

1. Greenland Ice sheet
2. Indian Desert
3. Amazon Forests
4. Coral Reefs
5. Boreal Forests
6. Melting of Arctic Ice

Select the correct code/s

1. 1, 3, 5 and 6
2. 1, 2, 3, 4 and 5
3. 2, 4 and 6
4. All

Solution- 1

The nine tipping elements are

1. Melting of Arctic sea-ice (approx 10 years)
2. Decay of the Greenland ice sheet (more than 300 years)
3. Collapse of the West Antarctic ice sheet (more than 300 years)
4. Collapse of the Atlantic thermohaline circulation (approx 100 years)
5. Increase in the El Nino Southern Oscillation (approx 100 years)
6. Collapse of the Indian summer monsoon (approx 1 year)
7. Greening of the Sahara/Sahel and disruption of the West African monsoon (approx 10 years)
8. Dieback of the Amazon rainforest (approx 50 years)
9. Dieback of the Boreal Forest (approx 50 years)

13. Consider the following statements

1. Lead is a toxic non-metal
2. India export majority of its Lead Production
3. Lead is used in Painting, Manufacturing of glasses and as anti-friction agent
4. Rajasthan is the leading producer of Lead in India

Select the correct code/s

1. 1, 2, 3 and 4
2. 2 and 3
3. 3 and 4
4. 1, 2 and 3

Solution- 3

Lead is a metal. Lead production is deficient hence import. Last two sentences are correct.

14. Natural Gas and LPG are one of the cleanest sources of available Energy. Consider the following statements regarding this

1. Natural gas has higher calorific value than LPG
2. LPG is more combustibile than Natural Gas
3. Natural Gas is heavier than LPG

Select the correct code/s

1. 1, 2 and 3
2. Only 3
3. 1 and 2
4. None

Solution- 4

Invert the statements

There are two main differences in the way that LPG (Propane) and natural gas (Methane) are burnt. The first difference is in the energy content.

LPG has a higher calorific value, or energy content, so less gas is required to produce the same amount of heat. LPG Needs More Oxygen. The second difference is in the oxygen to gas ratio required for proper combustion. LPG requires oxygen to gas ratio of approximately 25 to 1. Natural gas requires a ratio of around 10 to 1.

15. Consider the difference between Fission and Fusion reactions

1. Both gives chain reactions
2. Fission requires more energy than Fusion to start the reaction
3. Fusion gives more stable reaction than Fission

Select the correct code/s

1. 1, 2 and 3
2. 2 and 3
3. 1 and 2
4. None

Solution- 4

Fission gives Chain reactions not Fusion. Fusion requires tremendous energy to split the H-nuclei. Controlling the Fusion (High Energy production) is a major problem in Fusion Research. So, un-stable due to high energy generation.