

**IASbaba's Daily Prelims Test [Day 59]**

**Topic- Science & Tech, Current Affairs and Map based Questions**

**1. Consider the following statement**

**An ordinary light bulb has a rather short life because the**

1. Filament wire is not uniform.
2. Bulb cannot be evacuated completely.
3. Wires supporting the filament melt at high temperatures.

**Which of the above statements are correct?**

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

Solution- 3

**2. The blood glucose level is commonly expressed as**

1. Grams per litre
2. PPM
3. Mm of Hg
4. Milligram per decilitre

Solution- 4

**3. Consider the following statements regarding a motor car battery**

1. The voltage is usually 12 V.
2. Electrolyte used is hydrochloric acid.
3. Electrodes are lead and copper.
4. Capacity is expressed in ampere-hour.

**Which of the above statements are correct?**

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

Solution- 2

It is Lead-Acid battery and electrolyte used is solution of sulphuric acid and water.

**4. With reference to the latest developments in stem cell research, consider the following statements:**

1. Stem cells are unspecialized cells and cannot give rise to specialized cells.
2. Embryonic stem cells are also called as somatic stem cells
3. Embryonic stem cells can become all cell types of the body because they are pluripotent.
4. Adult stem cells are thought to be limited to differentiating into different cell types of their tissue of origin.

**Which of these statements are correct?**

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

Solution- 3

They can give rise to specialized cells. Adult stem cells are called somatic stem cell.

<http://stemcells.nih.gov/info/basics/pages/basics5.aspx>

**5. Match the following**

<b>Geological Parks</b>	<b>Location</b>
1. Nehru Park	Hyderabad
2. Saketi Fossil Park	Ambala
3. National Fossil Wood Park	Tamil Nadu

**Which of the above are correctly matched?**

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

Solution- 4

**6. Consider the following differences between Holography and Photography**

1. Both require lens to record images
2. If hologram is broken into pieces, it can still reconstruct the images unlike photography
3. Both works on the principle of diffraction and interference

**Select the INCORRECT statement/s**

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

Solution- 1

A lens is required in photography to record the image, whereas in holography, the light from the object is scattered directly onto the recording medium.

Third statement is true for holography only.

**7. Consider the following statements**

1. Plasma television faces the issue of screen burn-in of static images unlike LCD
2. LCD uses more electricity compared to Plasma.
3. LCD weighs less and produces less heat.
4. Plasma television is better in displaying faster moving images than LCD.

**Select the correct answer**

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

Solution- 2

LCD uses less electricity

**8. High Speed Packet Access (HSPA) consists of HSDPA and HSUPA. Consider the following statements regarding them**

1. In general HSUPA is installed before HSDPA for better service.
2. HSDPA has much faster speeds compared to HSUPA
3. HSPA is commonly referred to as 3.5 G

**Select the WRONG statement/s**

1. Only 3
2. 2 and 3
3. Only 1
4. All

Solution- 1

HSPA is commonly known as 3.5 G. In general HSDPA is installed before HSUPA.

It is common practice for most mobile networks to deploy HSDPA first before doing HSUPA. Based on the usage patterns of majority of the population, internet bandwidth usage is asymmetrical. This means that we often download more compared to uploading. Telecoms know this and that is why they want to improve downlink as soon as it's possible. There are areas in the world where only HSDPA is deployed while HSUPA is still pretty much absent.

Mainly because telecoms want to allocate as much bandwidth to downlink as they can while spending as little as they could. Even when fully deployed HSDPA would still have much higher speeds compared to HSUPA. This is in keeping with the asymmetric use of the bandwidth. Allocating equal bandwidth to each would result in a huge waste for the bandwidth allocated to the uplink.

**9. Consider the following differences between GPRS and GSM Technology**

1. GSM is an upgraded version of GPRS
2. GPRS is a data service while GSM handles both voice and data traffic
3. GSM has more slot for users than GPRS

**Select the correct code**

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

Solution- 3

GPRS is an upgraded version of GSM and GPRS has more slot for users.

**10. Which one of the following is the secondary source of light in a fluorescent lamp?**

1. Neon Lamp
2. Mercury vapour
3. Fluorescent coating on the glass
4. Argon gas

Solution- 3

**11. Consider the following statements**

1. Situated east of Madagascar in Indian ocean
2. Recently MH370 debris has been found on this island
3. Occupied by the French and has Euro as its currency

**Select the correct answer using codes**

1. Marshall Island
2. Diego Garcia
3. Reunion Island
4. Christmas Island

Solution- 3

**12. Select the odd one out of the following on the basis of climate**

1. Jordon
2. Israel
3. Lebanon
4. Turkey

Solution- 3

Lebanon- Only West Asian Nation not to have Desert

**13. Consider the following statements**

1. Mitun is the state animal
2. Myanmar borders on the East
3. About a million Amur Falcon roost in this State

**Select the correct answer using the code**

1. Mizoram
2. Manipur
3. Meghalaya
4. Nagaland

Solution- 4

**14. Consider the following statements**

1. Declared the first 'Open Defecation Free' district in the country
2. Has won the United Nations Public Service Award 2015 in the category of improving delivery of public services.

**Select the correct answer using the code**

1. South Dinajpur
2. Nadia
3. Murshidabad
4. Bankura

Solution- 2

**15. Consider the following statements**

1. Zemu glacier occupies the north of the State
2. Red Panda is the State animal
3. Famous for its hot springs

**Select the correct answer**

1. Arunanchal Pradesh
2. Sikkim
3. Meghalaya
4. Mizoram

Solution- 2

**16. Consider the following statements**

1. It is separated from EUROPE by Strait of Gibraltar
2. Rif Mountains are located in the North of the country
3. The capital is Rabat

**Select the correct answer**

1. Algeria
2. Tunisia
3. Mauritania
4. Morocco

Solution- 4

Was in news because of

1. UN to host new peace talks in Morocco for war-torn Libya- Indian Express
2. Gangster to be extradited from Morocco- Indian Express

**17. Major Inland Waterways of India**

**Match the three columns**

- |         |                               |                            |
|---------|-------------------------------|----------------------------|
| 1. NW1  | Ganga-Bhagirathi-Hoogly river | Allahabad – Haldia stretch |
| 2. NW2- | Brahmaputra                   | Sadiya – Assam stretch     |
| 3. NW3- | West Coast canals             | Kollam – Kottapuram        |
| 4. NW4  | Krishna and Godavari          | Kakinada – Puducherry      |
| 5. NW5  | Mahanadi- Brahmani river      | Talcher - Dhamra           |
| 6. NW6  | Barak river                   | Karimganj to Lakhipur      |



**Select the correct answer**

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

Solution- 3

**18. Match the followings**

**Waterfalls in India**

1. Dudsagar
2. Dugdhdhara
3. Chitrakot
4. Kandhadhar
5. Talakona
6. Nohsngithiang

**Location**

- M.P  
Goa  
Andhra Pradesh  
Odisha  
Chhattisgarh  
Meghalaya

**Select the correct codes**

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

Solution- 3

1 and 2 are interchanged. 3 and 5 are interchanged.