



## Daily Current Affairs Prelims Quiz 06-09-2024 (Online Prelims Test)

1) Consider the following statements with respect to NPS Vatsalya

1. It is a modified version of the National Pension System (NPS) specifically designed for specially challenged persons.
2. It has the potential to create significant wealth over time through compounding.

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

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

Answer : b

### National Pension System (NPS) Vatsalya

- NPS Vatsalya is a modified version of the National Pension System (NPS), designed specifically for **minors**.
- Under this scheme, parents or guardians will be able to open an NPS account for their children and make regular contributions until the child turns 18.
- The **primary advantage** of this NPS Vatsalya scheme is the potential to create significant **wealth over time through compounding**.
- **Features** - The account will convert seamlessly into a regular NPS account, allowing the beneficiary to manage their investments and savings independently.
- The scheme is expected to offer the same diverse investment options as the traditional NPS, including a mix of equity, government securities, and corporate bonds, offering flexibility for different risk profiles.
- Subscribers can opt for either an automatic choice (which adjusts investments based on the age of the subscriber) or an active choice to manage their investments.
- Partial withdrawals will likely be allowed after three years of account creation, with a cap of 25% of the contributed amount.
- Withdrawals can be made for specified purposes, such as education or medical treatment.
- It is seen as a powerful tool for financial inclusion, encouraging families to think about future financial security from a young age.
- It was first **announced in the 2024-25 Budget**, is poised to be a transformational financial tool for Indian families, empowering them to start saving early and consistently.

2) Consider the following statements with respect to Semiconductors

1. It is an integrated circuits that are made from pure elements, typically silicon or germanium or compounds such as gallium arsenide.
2. At zero Kelvin, a semiconductor serves as an insulator.
3. They are an essential component of electronic devices, enabling advances in communications, computing, healthcare and military systems.

How many of the statements given above are correct?

- a. Only one
- b. Only two
- c. All three
- d. None of the above

Answer : c

## Semiconductors

*India and Singapore inked agreements on semiconductor and digital technology recently.*

- Semiconductors, sometimes referred to as **integrated circuits (ICs) or microchips**, are made from pure elements, typically *silicon or germanium*, or compounds such as gallium arsenide.
- In a process called *doping*, small amounts of impurities are added to these pure elements, causing large changes in the conductivity of the material.
- They are an essential component of electronic devices, enabling advances in communications, computing, healthcare, military systems, transportation, clean energy, and countless other applications.
- Due to their role in the fabrication of electronic devices, semiconductors are an important part of our lives. Imagine life without electronic devices.
- **Properties - At zero Kelvin, a semiconductor serves as an insulator** and it functions as a conductor as the temperature increases.
- They have higher resistivity than conductors but a lower resistivity than insulators.
- They have higher resistivity than conductors but a lower resistivity than insulators.
- As the temperature increases, the resistance of semiconductor materials decreases, and vice versa.

3) Consider the following statements with respect to Tibetan Plateau

1. It is a high plateau situated on south-western China.
2. The region is occupied with high air density relatively that enables the violet sudden storms are common occurrences.

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

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

Answer : a

## Tibetan Plateau

- Historically, Tibet was much larger than the autonomous region, being made up of **3 major areas** such as:
  1. U-Tsang
  2. Amdo
  3. Kham
- While most of U-Tsang is in China's Tibet Autonomous Region, the other two lie outside it.
- **Lhasa** is the capital of Tibet Autonomous Region and the languages spoken are Tibetan and Mandarin.

- The Tibetan Plateau stretches miles into the sky, creating an environment drastically different from the lower atmosphere.
- This extreme altitude translates to significantly **thinner air** and is occupied with **lower air density relatively**.
- Beyond the air's density, the Tibetan Plateau is a meteorological maelstrom.
- Violent wind patterns, unpredictable turbulence, and sudden storms are common occurrences.
- Due to these reasons **no flight passes thorough the Tibetan Plateau**.



- Tibet could be divided into **two broad geographic divisions** such as:
  1. 'Lake region' in the West
  2. 'River region' to the East and South
- The "lake region" is an arid and wind-swept desert.
- It has a very arid alpine climate on account of the very high mountain barriers with annual precipitation around 100 millimetres and has no river outlet.
- **Mountain Peaks** - The prominent Mountain perks of Tibet are:
  - The Changtse, Lhotse, Makalu, Gauri Sankar, Gurla Mandhata, Cho Oyu, Mount Kailash, Namcha Barwa, Shishapangma and Yangra.
- **Rivers** - Tibet is the principal water tank of Asia and the source of some of the world's largest rivers.
- Tibet accounts for 6% of the annual throughput of water in Asia with around 90% of this water flowing outside the region through the rivers that originate in this region.
- **Major Rivers** that originate in the Tibet include:
  - Yarlung Tsangpo (Brahmaputra in India),
  - Machu (Yellow River in China) and Drichu (Yangtse in China),
  - Senge Khabab (Indus in India) and Phungchu (Arun in India),

- Gyalmo Ngulchu (Salween in Burma) and Zachu (Mekong in Thailand, Vietnam, Cambodia, Laos).
- **Native Wildlife** - Tibetan antelope, wild yak, wild ass and Tibetan argali, blue sheep, black-necked crane, Tibetan gazelle, giant panda, red panda, golden monkey.

