



## UPSC CURRENT AFFAIRS MCQS 20-04-2024

Q1:

Consider the following statements in respect of BrahMos missile:

1. It is a long-range supersonic cruise missile system.
2. It can be launched from land, sea and air platforms.
3. It is a joint venture between India and Russia.
4. BrahMos-II is the hypersonic version with Mach 7 speed.

How many of the statements given above are correct?

- A: Only one  
B: Only two  
C: Only three  
D: All four

**Answer: D**

**Explanation:**

India delivered BrahMos missiles to the Philippines as part of a \$375 million deal signed in 2022. BrahMos is a long-range supersonic cruise missile system capable of being deployed from land, sea or air. **Hence, statement 1 is correct.**

Developed by BrahMos Aerospace, it is one of the world's fastest cruise missiles, capable of reaching speeds of up to Mach 3. Named after the rivers Brahmaputra and Moskva (Russia), it was first tested in 2001 and has since been inducted into the Armed Forces. BrahMos is a cruise missile designed to deliver ordnance or payloads to targets. It can be launched from various platforms, including ground, air, sea and submarine. **Hence, statement 2 is correct.**

Propulsion primarily relies on jet engines, enabling it to fly at various altitudes within the atmosphere. BrahMos Aerospace was formed as a joint venture between India's DRDO and Russia's NPOM following a 1998 intergovernmental agreement. **Hence, statement 3 is correct.**



BrahMos has undergone several upgrades since its inception. It features advanced technologies such as stealth, guidance systems and "Fire and Forget" operation. BrahMos-NG is a multi-platform, multi-target, and lightweight weapon system with enhanced stealth capabilities. Designed for ground-based, aerial, surface, and underwater deployment, it boasts increased versatility and reduced radar cross-section. BrahMos-II is a hypersonic cruise missile intended for ship-based deployment. Inspired by Russia's 3M22 Tsirkon, it is expected to achieve speeds of up to Mach 7 and ranges exceeding 300 miles. **Hence, statement 4 is correct.**

**Q2:**

**Consider the following statements about electric air taxis, recently seen in news:**

- 1. They are electric-powered aircraft designed to reduce urban traffic congestion and offer faster travel times in crowded cities.**
- 2. They utilize electric propulsion systems, making them more eco-friendly compared to traditional fossil fuel-powered airplanes.**
- 3. They require dedicated infrastructure like helipads and vertiports for take-off, landing and passenger boarding within urban environments.**

**How many of the statements given above are correct?**

**A:** Only one

**B:** Only two

**C:** All three

**D:** None

**Answer:** C

**Explanation:**

Recently, Archer Aviation, backed by Stellantis and Boeing revealed plans to initiate trials of their electric air taxi in India next year, aiming for a commercial launch by 2026. Electric air taxis represent an innovative mode of transportation



aimed at addressing urban congestion and providing efficient, time-saving travel options in densely populated cities. **Hence, statement 1 is correct.**

They are powered by electric propulsion systems, making them environmentally friendly alternatives to traditional fossil fuel-powered aircraft. They contribute to reducing carbon emissions and mitigating the impact of air pollution. They leverage cutting-edge technology in electric propulsion, battery storage and autonomous flight systems to enable safe, quiet and efficient aerial transportation within urban areas. **Hence, statement 2 is correct.**

Electric air taxi operations require integration with existing urban infrastructure, including helipads and vertiports to facilitate take-off, landing and passenger boarding in urban areas. **Hence, statement 3 is correct.**

**Q3:**

**Consider the following statements about DURGA-2:**

**1. It is a laser weapon developed by DRDO that can be used on land, sea and air.**

**2. It uses sound waves to destroy targets.**

**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**

**Answer: A**

**Explanation:**

Recently, DRDO has initiated testing of a prototype for its DURGA-2 (Directionally Unrestricted Ray Gun Array) system. DURGA-2 is a laser weapon developed by the Defence Research and Development Organisation (DRDO) of India. It is a 100-kilowatt directed-energy weapon (DEW) that can be used on land, naval and air. It can neutralize drone attacks, deflect ballistic missiles and destroy fighter jets at the speed of light. **Hence, statement 1 is correct.**



It uses lasers, microwaves or particle beams to damage or destroy targets using focused energy. This system offers advantages over conventional munitions, transmitting lethal force at the speed of light and remaining unaffected by gravity or atmospheric drag. **Hence, statement 2 is incorrect.**

**Q4:**

**Consider the following statements about Vasuki indicus:**

- 1. It was a giant, extinct snake discovered in India, possibly the largest ever found.**
- 2. It lived alongside another giant snake, Titanoboa, during a time of warm climate.**

**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

**Answer:** C

**Explanation:**

Recently, Paleontologists in India unearthed fossilized remains of Vasuki indicus in Gujarat's Panandhro Lignite Mine, Kutch. Vasuki indicus is an ancient giant snake discovered in India, estimated to measure between 36 to 50 feet (11 to 15 meters) in length. Named after the mythical snake king associated with Hindu deity Shiva, Vasuki lived approximately 47 million years ago in the marshy evergreen woods of western India. It is an extinct species of giant snake discovered in India, estimated to be one of the largest snakes ever known to have existed. **Hence, statement 1 is correct.**

Vasuki shares similarities with Titanoboa, another enormous snake found in Colombia, both living during periods of unusually warm temperatures. Fossils of Madtsoiidae snakes, including Vasuki indicus, have been previously found in



India, with late Oligocene specimens discovered in Ladakh Himalaya in 2022. **Hence, statement 2 is correct.**

**Q5:**

**Consider the following statements about the Shompen Tribe:**

- 1. They are classified as a Particularly Vulnerable Tribal Group (PVTG) by the Government of India.**
- 2. They had an estimated population of 229 according to the 2011 Census.**

**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

**Answer:** C

**Explanation:**

Recently, Shompen tribe from Great Nicobar Island's rainforests, voted for the first time in the Andaman and Nicobar Lok Sabha constituency, a historic democratic milestone. The Shompen tribe is classified as a Particularly Vulnerable Tribal Group (PVTG) by the Government of India, signifying their vulnerable socio-economic status and cultural distinctiveness. **Hence, statement 1 is correct.** They primarily reside in the dense tropical rainforests of Great Nicobar Island, which is part of the Andaman and Nicobar Islands territory. They are nomadic hunter-gatherers who live in small groups. Historically, the Shompen tribe has maintained a secluded and isolated lifestyle, with limited contact with the outside world. According to the 2011 Census data, the estimated population of the Shompen tribe was 229 individuals. **Hence, statement 2 is correct.**