

Q: Consider the following statement regarding MRSAM:

1. It is an advanced air and missile defence system.
2. It is capable of taking down multiple aerial targets within a 70km range.
3. It is jointly developed in collaboration of Indian and US Airforce.

Choose the correct option from the codes given below:

- a) 1 and 2
- b) 2 and 3
- c) 1 and 3
- d) 1, 2 and 3

Ans: a

Explanation:

- MRSAM is an advanced air and missile defence system that provides protection against a variety of aerial platforms. The MRSAM is used by the Indian Air Force, Indian Army, Indian Navy and Israeli Defence Forces.
- The system includes an Advanced Phased Array Radar, command and control shelter, mobile launchers and interceptors with an advanced RF seeker.
- MRSAM is jointly developed by IAI and India's Defence Research Development Organization (DRDO) in collaboration with India and Israel for India's Armed Forces.
- The MRSAM missile is capable of taking down multiple aerial targets such as jets, drones, helicopters, and incoming missiles, within a 70km range.

Q: Recently it is proposed to establish an India Centre for Lab grown Diamond (InCent-LGD). Consider the following statement:

1. The Gems and Jewellery sector contribute to more than one tenth to India's total merchandise export.
2. LGD has vast application in field of defence, optics, thermal and medical industry.
3. Indian market to lab grown diamond jewellery is expected to exceed by \$ 15 billion by 2035.

Choose the correct option from the codes given below:

- a) 1 and 2
- b) 2 and 3
- c) 1 and 3
- d) 1, 2 and 3

Ans: b

Explanation:

- The Gems and Jewellery sector plays a significant role in the Indian economy, contributing around 9% to India's total merchandise export.
- Over the past decade, there has been several positive developments in the Gem & Jewellery sector globally. One of the major technological developments in this sector has been Laboratory-grown diamonds (LGD).
- LGD has vast application in field of defence, optics, jewellery, thermal & medical industry.
- Globally, the market stood at \$1 billion in 2020, the lab-grown diamond jewellery market is expected to rapidly rise to \$ 5 billion by 2025 and exceed \$ 15 billion by 2035.

Q: Consider the following statement:

1. The 18th UIC World Security Congress was jointly organized by Railway Protection Force (RPF) and the International Union of Railways (UIC).
2. International Union of Railways (UIC) headquarter is in Paris.

Choose the correct option from the codes given below:

- a) 1 Only
- b) 2 Only
- c) 1 and 2
- d) None of the above

Ans: c

Explanation:

- The 18th UIC World Security Congress, jointly organized by Railway Protection Force (RPF) and the International Union of Railways (UIC), conclude with the adoption of the Jaipur Declaration by the attendees.
- The conference brought together experts, stakeholders, and delegates from around the world to discuss the latest developments and best practices in railway security, focusing on the theme of "Railway Security Strategy: Responses and Vision for Future."

- The UIC (Union International Des Chemins) or International Union of Railways established in 1922 is headquartered in Paris. It is the worldwide professional association representing the railway sector for research, development & promotion of rail transport.

Q: Consider the following statement:

1. India is now home to the third-largest startup ecosystem in the world.
2. The electric vehicle (EV) industry comes under sunrise sector.
3. FAME scheme is to incentivise EV adoption.

Choose the correct option from the codes given below:

- a) 1 and 2
- b) 2 and 3
- c) 1 and 3
- d) 1, 2 and 3

Ans: d

Explanation:

- Over the past decade, the Indian startup ecosystem has come a long way. With the rise of digital technologies and an increasing number of young entrepreneurs, the country is now home to the third-largest startup ecosystem in the world.
- The electric vehicle (EV) industry is one such sunrise sector where India aims to shift gears with the ambitious target of having 30 percent of its vehicles powered by electricity by 2030.
- EV companies witnessed the highest-ever funding in 2022, with a year-on-year increase of 117 percent. Additionally, government initiatives like the Faster Adoption and Manufacturing of (Hybrid &) Electric Vehicles (FAME) scheme further incentivise EV adoption.

Q: Consider the following:

1. Bhakra Dam: Sutlej
2. Ranjit Sagar: Ravi
3. Pandoh: Brahmaputra

Which among the following is correctly matched?

- a) 1 and 2
- b) 2 and 3
- c) 1 and 3
- d) 1, 2 and 3

Ans: a

Explanation:

- Currently, India utilises around 94-95 per cent of its share of water in the eastern rivers through a network of dams, including the Bhakra on Sutlej, Ranjit Sagar on Ravi, and Pong and Pandoh on Beas.
- The three projects; Shahpur Kandi, Ujh and the second Sutlej-Beas link will help India utilise the remaining 5 per cent of water that currently flows into Pakistan.
- India has several ongoing as well as proposed projects on the three western rivers as well. Currently, it is locked in a dispute with Pakistan over two of its hydroelectric projects on the western rivers Kishanganga and Ratle.
- The World Bank has appointed a neutral expert on the request of India and set up a Court of Arbitration on the request of Pakistan to resolve the matter.