Daily Current Affairs Prelims Quiz 13-05-2024 & 12-05-2024 (Online Prelims Test)

1) Consider the following statements with respect to Adhai Din Ka Jhonpra

1. The mosque was built by the first Sultan of Delhi, Qutub-ud-Din-Aibak, in 1199 AD.
2. It is located at Qutub-Minar complex of Delhi.
3. It is listed under the World Heritage Convention of UNESCO.

How many of the statements given above are correct?

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

Answer : a

Adhai Din Ka Jhonpra

Recently Rajasthan assembly speaker demanded an Archeological Survey of India (ASI) survey at Adhai Din Ka Jhonpra in Ajmer to investigate about the claims of existence of Sanskrit school and a temple.

- The Adhai Din Ka Jhonpda was originally a Sanskrit college, which, in 1192, was converted into a mosque by Qutb-ud-din Aibak, the first Muslim ruler of Delhi.
- ***It is located at Ajmer, City in Rajasthan***.
- The mosque is known for its unique architecture, which is a ***blend of Hindu and Islamic styles***.
- The structure was further *beautified by Sultan Iltutmish* in 1213 AD.
- This mosque is an important historical monument *protected by the Archaeological Survey of India*.
- It is ***not listed*** under the World Heritage Convention of UNESCO.
- It is contemporary to the Quwal-ul-Islam mosque (power of Islam) at Qutub-Minar complex of Delhi.
- Recently the Jain monk delegation have claimed to have found idols and structures indicating a Jain temple was present earlier.

2) Consider the following statements with respect to Rules on Contesting Seats

1. There is no minimum educational qualification needed to contest general elections in India.
2. For Lok Sabha elections, a candidate can be a voter from any constituency across India to contest from any parliamentary seat.

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 : a

Rules on Contesting Seats

Recently Congress leader Rahul Gandhi filed his nomination papers at Rae Bareli in Uttar Pradesh, for Lok Sabha election 2024.

- The Representation of the People Act (RPA), 1951 provides Rules on Contesting Seats.
- Section 33(7) of the RPA, 1951 was *amended in 1996 to allow a candidate to contest from a maximum of two constituencies* in one election.
- Prior to that, there was *no limit on the number of constituencies*.
- Section 70 of the RPA, 1951 mandates that a candidate *can hold only one seat at a time*, even if elected from multiple constituencies.
- If elected from two seats, the candidate has to vacate one, leading to a by-election.
- This provision of allowing a candidate to contest from two seats, despite being able to hold only one, has been criticized.
- *It leads to avoidable by-elections and wastage of resources/effort*.
- For Legislative Assembly Elections, a candidate has to be a voter in that particular state to contest from there.
- For contesting Lok Sabha (parliamentary) elections, a candidate can be a registered voter from any constituency across India to contest from any Lok Sabha seat in the country, ***with three exceptions***:
    1. Assam
    2. Lakshadweep
    3. Sikkim

- For these three states/UTs, ***the candidate needs to be a registered voter within that particular state/UT*** in order to contest the Lok Sabha election from a constituency in that state/UT.
- The ***minimum age for a person to contest Lok Sabha and Assembly polls*** is ***25 years***, while one can become a member of the *Rajya Sabha or the State Legislative Council* only at ***30 years***.
- ***There is no minimum educational qualification needed to contest general elections in India***.
- Candidates must be citizens of India, registered in some constituency of the country as a valid voter and *must not have been convicted of any offence punishable by more than two years*.
- **Disqualification of candidates** – A person shall be disqualified from being chosen as or being a member of either House if he holds any *office of profit* under the Government of India or any State.
- If he or she is of unsound mind and stands so declared by a competent court and an undischarged insolvent.
- If he or she is not a citizen of India or has voluntarily acquired the citizenship of a foreign state.
- Under the RPA Act, if a person is *convicted of any offence and sentenced to an imprisonment of two years or more*, this will lead to his disqualification to contest elections.
- **Changes undertaken by the Election Commission of India (ECI)** – It include decreasing the cash donation limit from 20,000 rupees to 2,000 rupees.
- For the 2024 polls, the ECI has *banned cash transportation in bank vehicles after sunset*.
- The Commission is *also monitoring non-scheduled chartered flights for cash, liquor, and drug movement*.
- The Electoral Bond Scheme, notified in January, 2018, allowing anonymous contributions to limit use of cash, was scrapped by the Supreme Court in 2024.

3) Consider the following statements with respect to 3D Printing

1. It is an additive process that uses computer-created design to make three-dimensional objects layer by layer.
2. A personal computer is necessary for 3D Printing.
3. 3D printers construct the desired object by using a subtractive manufacturing.

How many of the statements given above are correct?

a. Only one

b. Only two

c. All Three

d. None of the above

Answer : b

3D Printing

Recently Indian Space Research Organisation (ISRO) has successfully tested 3D-printed rocket engine.

- 3D printing is a process ***that uses computer-created design to make three-dimensional objects layer by layer***.
- It is an ***additive process***, in which layers of a material like plastic, composites or bio-materials are built up to construct objects that range in shape, size, rigidity and colour.
- To carry out 3D printing, ***one needs a personal computer connected to a 3D printer***.
- All they need to do is design a 3D model of the required object on computer-aid design (CAD) software and press ‘print’. The 3D printer does the rest of the job.
- 3D printers construct the desired object by using a ***layering method***, which is the complete

opposite of the subtractive manufacturing processes.

- 3D printers build from the bottom up by piling on layer after layer until the object looks exactly like it was envisioned.
- The (3D) printer acts generally the same as a traditional inkjet printer in the direct 3D printing process.
- These machines are capable of printing anything from ordinary objects like a ball or a spoon to complex moving parts like hinges and wheels.
- This technology helped ISRO bring down the number of parts in the engine from 14 to a single piece.
- The space agency was able to eliminate 19 weld joints and saved 97% of raw material. It also reduced the overall production time by 60%.

4) Consider the following statements:
Statement-I: Auroras are caused by the interaction between charged particles from the Sun's solar winds and the Earth's magnetosphere.
Statement-II: Auroras can be witnessed only in the extreme northern or southern latitudes.
Select the correct answer using the codes given below:

a. Both Statement-I and Statement-II are correct and Statement-II is the correct explanation for Statement-I

b. Both Statement-I and Statement-II are correct and Statement-II is not the correct explanation for Statement-I

c. Statement-I is correct but Statement-II is incorrect

d. Statement-I is incorrect but Statement- II is correct

Answer : c

Aurora

Recently Indian Astronomers captured the auroras through all-sky cameras positioned around the Indian Astronomical Observatory (IAO) in Hanle, Ladakh.

- Aurora are ***bright and colourful lights***, formed due to an active interaction in Space between charged solar winds and the Earth's magnetosphere.
- Solar winds are ejections of charged particles from the Sun's atmosphere, mostly composed of protons and electrons.
- ***Auroras are caused by the interaction between charged particles from the Sun's solar winds and the Earth's magnetosphere***.
- The collisions produce light, "much like how electrons flowing through gas in a neon light collide with neon and other gasses to produce different coloured light bulbs.
- Auroras or polar lights are usually witnessed only in the extreme northern (Aurora Borealis) or southern (Aurora Australis) latitudes near the poles.
- However, ***they were recently spotted from the low-latitude region of Ladakh in India due to heightened solar activity***.
- Recently at least 4 strong solar storms in the form of Coronal Mass Ejections (CMEs) hit the Earth, originating from an active region on the Sun.
- These intense CMEs travelled at very high speeds of 700-815 km/second and disturbed the space weather around Earth.
- The strong geomagnetic storms allowed the aurora lights to be visible from lower latitudes like Ladakh, instead of just the Polar Regions.
- Similar intense solar activity had last occurred in 2003 enabling aurora sightings from lower latitudes.
- The current period of high solar activity is expected to continue producing CMEs that can cause space weather disturbances around Earth for the next couple of days.
- Intense solar storms can potentially disrupt satellite operations, navigation systems, cause atmospheric drag on satellites, and increase radiation risks.

5) Consider the following statements with respect to New Space India Limited (NSIL)

1. It is the nodal agency for carrying out Polar Satellite Launch Vehicle (PSLV) production through Indian Industry under consortium route.
2. It is mandated to establish and maintain national space infrastructure to meet India's telecommunication needs.
3. It is the commercial arm of the Department of Space.

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

New Space India Limited (NSIL)

NSIL seeks for private partners to build its heavy lift rocket LVM3 (Geosynchronous Satellite Launch Vehicle Mk III).

- New Space India Limited is a wholly *owned commercial arm of the Indian government under the Department of Space*, incorporated in *2019*.
- It is designated as the *nodal agency for production of PSLV* launch vehicles through an Indian industry consortium.
- NSIL is *mandated to establish and maintain national space infrastructure to meet India's telecommunication needs*.
- Its primary responsibility is to enable and promote Indian industries to take up high-technology space-related activities.
- NSIL aims to commercially exploit products, services and technologies from India's space program drawing on ISRO's heritage.
- Its major business areas include:
    - Production of PSLV and SSLV launch vehicles through Indian industry partners.
    - Production and marketing of space-based services like launch services, transponder leasing, remote sensing and mission support services.
    - Building communication and earth observation satellites as per user requirements.
    - Transfer of technologies developed by ISRO centers and DOS institutions to industries.
    - Marketing of spin-off technologies, products and services from ISRO activities.
    - Providing consultancy services related to space technologies.