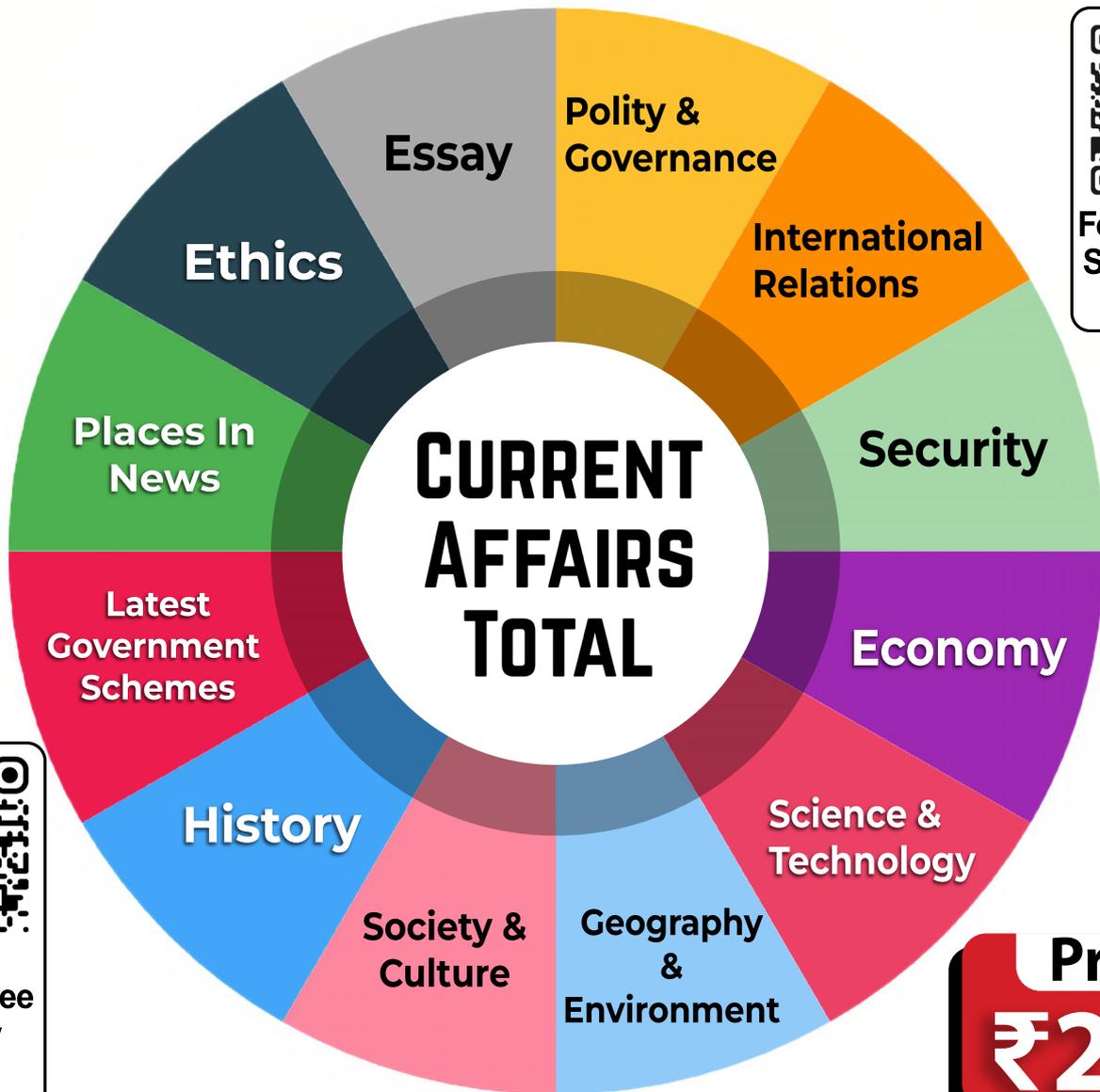




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POLITY & GOVERNANCE

1. Property Registration and Title in India

Context

The Supreme Court, in *Samiullah vs State of Bihar* (2025), examined Bihar's mutation-linked property registration rules and described property transactions in India as "traumatic". The judgment has renewed debate on the difference between registration and ownership (title) and the need for land administration reforms.

Q1. What are mutation-linked property registration rules?

1. Mutation means **updating land records** to show the name of the new owner after a property is sold or transferred.
2. Under **mutation-linked registration rules**, a property **cannot be registered** unless the seller first proves that:
 - a. Their name is already entered in land revenue records (mutation), and
 - b. Documents like **Jamabandi or holding records** are produced.
3. In simple words: **No mutation proof → no property registration.**

Q2. What is Property Registration and Title (ownership)?

1. Property registration is the **official recording of a transaction document** (sale deed, gift deed, etc.) with the government under the Registration Act.
2. Its purpose is to:
 - a. Give public notice of a transaction
 - b. Record who transferred property to whom
 - c. Prevent secret or fraudulent dealings
3. **Title** means **who legally owns the property.**
 - a. **Ownership is finally decided only by a court**, not by a registration office.
 - b. A court decides ownership by looking at old sale deeds, who is in possession of the land, mutation (revenue) records and other supporting evidence.
4. In simple words, registration **only records the transaction** (who sold the property to whom) and **does not guarantee ownership**. It only creates an **initial as-**

sumption that the buyer may be the owner, which can be challenged in court.

Q3. Why is Registration Different from Title?

1. Registration is kept different from Title because India does **not yet have conclusive land titles** (final, guaranteed ownership records).
2. So until land records become fully reliable:
 - a. Courts must protect people's **freedom to buy and sell property**, and
 - b. At the same time ensure **fraud is controlled**
3. The principle that **registration ≠ ownership** was also upheld in **K. Gopi vs Sub-Registrar (2024)** where the Court struck down a rule that forced sellers to prove ownership before registration in Tamil Nadu.
4. The upcoming **Registration Bill, 2025** also follows this principle.
5. This separation **prevents administrative overreach** and **protects the right to property.**

Q4. Why did the Court call property transactions in India "traumatic"?

Property transactions are described as *traumatic* because:

1. **Fragmented land administration:** Multiple departments work separately. Registration, revenue records, and land surveys are not linked.
2. **Presumptive title system:** Ownership is never final and can be challenged in court, even after purchase.
3. **Buyers must check many records like** Old deeds, mutation records, possession, receipts, and surveys.
4. **Long delays and litigation:** Errors or disputes can take years to resolve.
5. **Historical complexity:** Colonial land laws, Different systems in princely states, Land reforms after independence and Land ceiling laws created varied types of land titles and records across regions.

Q5. Why did the Supreme Court strike down these rules?

1. The Supreme Court struck down **Bihar Registration Rules, 2019**, which required sellers to show **mutation documents** (Jamabandi, holding allotment) before property registration.
2. The rules were struck down because:
 - a. **Beyond legal powers:** The rules exceeded the authority given under the Registration Act.
 - b. **Registration was wrongly linked to title:**

Making mutation mandatory meant forcing sellers to prove ownership, which registration officers are **not empowered** to decide.

- c. **The mutation process itself was incomplete:** Bihar's Mutation Act and land surveys are unfinished, making compliance practically impossible.
3. So, the rules were **illegal and arbitrary**.
4. The Court reaffirmed that:
 - a. Registration and title are **legally distinct**
 - b. Questions of **ownership can only be decided by civil courts**

Q6. How Land Administration Can Be Reformed?

1. Administrative Reforms

- a. Integrate **registration, revenue, and survey records**
- b. Reduce duplication and inconsistencies
- c. Ensure automatic updating of records

2. Digital and Technological Solutions

- a. **Karnataka's Bhoomi and KAVERI** systems link registration with ownership records
- b. Similar efforts underway in other States

3. Use of Blockchain Technology

- a. Blockchain creates:
 - i. Tamper-proof records
 - ii. Transparent transaction history
 - iii. Chronological ownership trail
- b. **Andhra Pradesh blockchain pilot:**
 - i. Reduced land disputes by **50%**
 - ii. Improved transaction efficiency by **30%**

4. Caution

- a. Technology must be introduced **after correcting existing data**
- b. Incorrect data on blockchain can worsen problems
- c. Reforms must align with existing legal and administrative systems

Implications

1. The judgment strengthens **property rights** under Article 300A.
2. It limits the arbitrary power of registration officials.
3. It reinforces the separation between **administrative functions** and **judicial authority**.
4. It highlights the urgency of **land record reforms**.

Conclusion

The Supreme Court's ruling highlights deep flaws in India's land governance system. Administrative integration, legal clarity, and careful use of technology are essential to make property transactions simpler, safer, and less traumatic.

2. Child Trafficking in India

Context

India's response to child trafficking has come under renewed scrutiny following recent judicial directions and data showing low conviction rates despite large-scale child rescues. This highlights gaps in enforcement and coordination, even though India has a strong constitutional and legal framework to combat trafficking.

Q1. What is child trafficking and why is it a serious concern in India?

1. Child trafficking is a **grave violation of human rights**.
2. It involves:
 - a. **Recruitment, transportation, harbouring, or receipt** of children.
 - b. **Exploitation** such as forced labour, sexual exploitation, slavery, servitude, or organ removal.
3. Despite legal safeguards, trafficking networks persist due to **socio-economic vulnerabilities** and **weak enforcement outcomes**.
4. Official data show a large number of rescues each year but **disproportionately low convictions**, exposing **gaps between law and justice** delivery.

Q2. How is child trafficking defined internationally and in Indian law?

1. At the international level, the **Palermo Protocol (2000)** defines child trafficking.
 - a. Any **movement or exploitation** of a **child** for exploitative purposes is trafficking.
 - b. **Consent of the child is irrelevant**.
2. This principle is **incorporated** into **Indian law**.
3. Under the **Bharatiya Nyaya Sanhita, 2023**, trafficking includes:
 - a. Recruitment, transportation, or harbouring through **coercion, deception, abuse of power, or inducement**.
 - b. **Multiple forms of exploitation**, including physical, sexual, economic, and organ trafficking.

Q3. What constitutional protections exist against child trafficking?

1. The Constitution of India provides a **strong protective framework**.
2. **Key provisions** include:
 - a. **Article 23** – prohibition of human trafficking and forced labour.
 - b. **Article 24** – prohibition of child labour in hazardous industries.
3. **Directive Principles** further reinforce protection.
 - a. **Article 39(e) and (f)** mandate safeguarding children from abuse.
 - b. They require conditions of freedom, dignity, and healthy development.
4. These provisions impose a **positive obligation on the State** to prevent exploitation.

Q4. What are the major legislations addressing child trafficking?

1. India has enacted **multiple sector-specific laws**.
2. Important legislations include:
 - a. **Bharatiya Nyaya Sanhita, 2023** – criminalises trafficking and buying or selling of minors.
 - b. **Immoral Traffic (Prevention) Act, 1956** – targets trafficking for sexual exploitation.
 - c. **Juvenile Justice Act, 2015** – focuses on care, rehabilitation, and reintegration.
 - d. **POCSO Act, 2012** – provides stringent punishments for sexual offences against children.
3. The POCSO Act is significant because:
 - a. It is **gender-neutral**.
 - b. It **enables fast-track courts** for speedy trials.

Q5. How has the judiciary shaped India's anti-trafficking framework?

1. The judiciary has recognised trafficking as a **violation of the right to life and dignity**.
2. **Key Supreme Court judgments** include:
 - a. **Vishal Jeet v. Union of India** – emphasised prevention and rehabilitation.
 - b. **M C Mehta v. State of Tamil Nadu** – addressed child exploitation and labour.
 - c. **Bachpan Bachao Andolan v. Union of India** – strengthened rescue and rehabilitation mechanisms.
3. **Recent directions** stress:
 - a. **Victim-centric approaches**.
 - b. **Accountability** of authorities.
 - c. **Coordinated enforcement** across agen-

cies.

Q6. What are the key structural challenges in tackling child trafficking?

1. Several **systemic challenges** weaken outcomes.
2. Major issues include:
 - a. **Low conviction rates**, reducing deterrence.
 - b. Poverty, migration, disasters, and family breakdown **increase vulnerability**.
3. **Emerging challenges** are also significant.
 - a. **Misuse of digital platforms** for recruitment through fake opportunities.
 - b. **Trafficking networks** operating across State boundaries.
4. Since **law and order** is a **State subject**, weak Centre–State coordination further complicates enforcement.

Q7. What is the way forward to strengthen India's anti-trafficking response?

1. A **multi-dimensional strategy** is essential.
2. **Priority actions** include:
 - a. **Improving quality** of investigation and prosecution.
 - b. **Strengthening** rehabilitation and reintegration mechanisms.
3. **Systemic reforms** are equally important.
 - a. Enhancing **digital surveillance** and **intelligence sharing**.
 - b. Ensuring **faster trials** and higher conviction rates.
4. Addressing root causes is critical.
 - a. Social protection, education, livelihood support, and **awareness programmes**.
 - b. **Strong institutional partnership** between the Union and States.

Conclusion

India has a **robust legal and constitutional framework** against child trafficking, but **weak enforcement and low convictions** undermine its impact. **Effective coordination, victim-centric justice, and credible deterrence** are essential to close the gap between law and outcomes.

3. Delimitation and Degressive Proportionality

Context

Southern States that invested early in health, education, and population control now face political and fiscal disadvantages. Population-based redistribution and upcoming delimitation threaten to reduce their relative

representation, prompting calls for a fairer principle of representation.

Q1. Why are southern States facing disadvantages today?

1. Reduced Fiscal Transfers

- The **Finance Commission of India** assigns nearly 50% weight to population in tax devolution.
- Lower population growth has reduced allocations to southern States.

2. Political Representation Risk

- While the proportion of seats may remain similar, the absolute gap in Lok Sabha seats between northern and southern States is likely to widen.
- This would reduce the south's relative political influence.

3. Rewarding High Population Growth

- States with higher population growth gain more MPs.
- States that achieved population stabilisation face relative loss.

Q2. How does the Census and Delimitation timeline affect this issue?

- The Census, due in 2021, was delayed and is now expected by October 2028.
- After the Census, a **Delimitation Commission** will be formed.
- Its recommendations will apply before the 2029 Lok Sabha elections.
- This timing makes the outcome politically irreversible for a long period.

Q3. Why is delimitation particularly sensitive for southern States?

- Most population growth since 1991 has occurred in northern States.
- Southern States achieved lower fertility through public investment.
- Delimitation based purely on population would penalise good governance outcomes.
- This raises a federal fairness concern, not merely a regional grievance.

Q4. What are the possible solutions to ensure fair representation?

1. Increase Lok Sabha seats using the 2011 Census

- No State would lose existing seats.
- Lok Sabha strength could rise to around 866.
- Minimises disruption but still rewards high

population growth.

2. Equal representation of States in the Rajya Sabha

- Each State could receive an equal number of seats.
- Similar to the US Senate model.
- Would strengthen federal balance but faces political resistance.

3. Expand State Legislative Assemblies

- Equalise representatives per population at the State level.
- Improves grassroots representation in populous States.
- Does not directly address Lok Sabha imbalance.

4. Adopt a mixed formula for Lok Sabha seats

- Allocate 60% of seats by population.
- Allocate 40% based on population control performance.
- Rewards States that reduced fertility.
- Offers a common negotiating platform for the south.

Q5. What constitutional precedent supports the southern States' case?

- The **84th Constitutional Amendment Act** froze Lok Sabha seats until after 2026.
- Its objective was to motivate population stabilisation.
- This establishes that representation need not be based on population alone.
- It supports balancing equity with responsibility.

Q6. What is the principle of Degressive Proportionality?

- It is used for representation in the **European Parliament**.
- Larger entities get more seats, but fewer seats per person.
- Smaller entities get fewer seats, but greater per-capita representation.
- It prevents domination by populous entities while preserving democracy.
- It is a compromise between:
 - Pure population proportionality
 - Equal representation of States

Q7. How do Finance Commissions already use similar logic?

1. Income Distance

- Rewards poorer States.

2. Population Criteria

- a. Uses both 1971 and 2011 Census figures.
- b. Balances current needs with population control incentives.

3. Demographic Performance

- a. Rewards States that reduced fertility.

4. Tax Effort

- a. Encourages efficient revenue mobilisation.

If such a multidimensional approach is valid for finance, the same logic can apply to political representation.

Q8. Why must southern States act collectively now?

1. Delimitation decisions are approaching and irreversible.
2. Individual State efforts will lack impact.
3. A united stance improves bargaining power.
4. Degressive proportionality offers a constitutionally defensible compromise.

Conclusion

Delimitation based purely on population risks penalising States that governed well. By uniting around degressive proportionality, southern States can defend federal fairness, reward demographic responsibility, and preserve balanced representation in India's democracy.

4. Digital Arrest Scams in India

Context

India's rapid shift towards digital payments and online services has brought convenience, but also a surge in cyber-enabled frauds.

One of the most alarming trends is the rise of "digital arrest" scams, where criminals impersonate law enforcement officials to extort money.

With losses running into thousands of crores and growing public anxiety, the issue has moved from being a law-and-order concern to a systemic financial and governance challenge, prompting coordinated action by the government and regulators.

Q1. What are "digital arrest" scams, and why do they represent a new and dangerous form of cyber-enabled crime in India?

1. Digital arrest scams are a form of **cyber-enabled social engineering fraud** where criminals impersonate police officers, CBI officials, or other law enforcement authorities through video calls.
2. Victims are shown fake identity cards, forged arrest warrants, and are accused of crimes such as money

laundering or drug trafficking.

3. What makes these scams especially dangerous is the **psychological pressure** applied. Victims are often kept isolated for hours, threatened with arrest, and coerced into transferring money to multiple mule accounts.
4. The use of leaked personal data increases credibility and fear.
5. Unlike traditional frauds, these scams exploit **fear of the state**, making even educated individuals vulnerable.

Q2. Why have digital arrest scams grown rapidly in India despite improvements in digital infrastructure and cyber laws?

1. The growth of digital arrest scams is linked to several structural factors:
 - a. **Rapid digitalisation** has outpaced digital literacy and consumer awareness.
 - b. **Instant payment systems (UPI)** allow real-time transfers, leaving little time to reverse fraud.
 - c. **Data leaks and oversharing** on digital platforms enable targeted attacks.
 - d. **Cross-border cybercrime networks** operate beyond the effective reach of local policing.
2. While laws exist, enforcement struggles with speed, jurisdictional limits, and the sophistication of fraud networks. This gap has allowed such scams to scale rapidly.

Q3. What are the economic and social impacts of digital arrest frauds on India's digital payment ecosystem?

1. The impact goes beyond individual losses:
 - a. **Financial losses** are estimated at nearly ₹3,000 crore from digital arrest scams alone.
 - b. **Erosion of trust** in digital payments threatens India's push for a less-cash economy.
 - c. **Psychological trauma** affects victims, particularly senior citizens.
 - d. **Systemic risk** emerges as banks face reputational damage and rising disputes.
2. Recognising these risks, even the Supreme Court has taken **suo motu cognisance**, highlighting the seriousness of the problem.

Q4. What is the proposed transaction "kill switch," and how can it help prevent financial losses during digital frauds?

1. The transaction "kill switch" is a proposed **emergency control feature** within banking and UPI apps. Once activated by a user suspecting fraud:

- a. All banking and payment transactions are **instantly frozen**
 - b. Further fund transfers are blocked in real time
 - c. Authorities get a window to investigate before money is laundered
2. This tool aims to provide **last-mile consumer protection**, especially during high-pressure fraud situations like digital arrests, where delays can mean irreversible losses.

Q5. Why is the government considering a fraud insurance mechanism, and how does it reflect a shift in thinking about cyber fraud risks?

1. Traditionally, fraud was treated as a **compliance failure** or customer negligence. However, the scale and sophistication of digital frauds have forced a rethink.
2. The proposed fraud insurance mechanism recognises that:
 - a. Individual vigilance alone is insufficient
 - b. Fraud has become a **system-wide financial risk**
 - c. Victims need some form of financial protection
3. This marks a shift towards viewing digital fraud as a **shared responsibility** of banks, regulators, insurers, and technology platforms.

Q6. What role does the Reserve Bank of India play in addressing digital frauds, and why is fraud now seen as a systemic risk?

1. According to the **Reserve Bank of India**, India recorded nearly **24,000 fraud cases involving ₹34,771 crore** in 2024–25.
2. Through its **Payment Vision 2025**, the RBI has:
 - a. Flagged fraud as a **balance-sheet and stability risk**
 - b. Proposed studying a **Digital Payment Protection Fund (DPPF)**
 - c. Pushed banks towards real-time monitoring and fraud analytics
3. This reflects the understanding that unchecked fraud can undermine financial stability and digital confidence.

Q7. How does the proposed insurance pool model differ from existing cyber insurance, and why is it preferred?

1. Existing cyber insurance largely excludes **first-party fraud losses**, especially those caused by social engineering.
2. The proposed **insurance pool model** differs by:
 - a. Pooling risk across banks, insurers, and pos-

sibly the state

- b. Covering large, low-frequency but high-impact fraud events
 - c. Keeping premiums affordable through risk-sharing
3. Similar models exist for terrorism insurance globally, making this a practical solution for managing tail risks in digital finance.

Q8. What institutional coordination mechanisms have been created to combat digital arrest scams, and why are they necessary?

1. A high-level **Inter-Departmental Committee (IDC)** chaired by the Ministry of Home Affairs has been formed, involving:
 - a. **Ministry of Home Affairs**, MeitY, DoT, DFS, MoLJ
 - b. **Indian Cyber Crime Coordination Centre**, RBI, CBI, NIA
 - c. Engagement with tech firms like Google and WhatsApp
2. Such coordination is essential because digital fraud spans **finance, telecom, law enforcement, and technology**, making siloed responses ineffective.

Q9. What are the key challenges in implementing these solutions, and what should be the way forward for India?

1. **Key challenges include:**
 - a. Preventing misuse or accidental triggering of kill switches
 - b. Ensuring interoperability across banks and fintech platforms
 - c. Avoiding moral hazard due to insurance coverage
2. **Way forward:**
 - a. Clear SOPs and legal backing for emergency controls
 - b. AI-driven fraud detection and transaction velocity checks
 - c. Public awareness campaigns on digital arrest scams
 - d. Regulatory coordination among RBI, IRDAI, MeitY, and banks

Conclusion

Digital arrest scams highlight how **India's digital transformation has outpaced traditional risk controls**. The proposed kill switch and fraud insurance mechanisms mark a decisive shift towards **proactive, consumer-centric, and system-wide protection**. If implemented with strong safeguards and coordination, these measures can restore trust and strengthen the resilience of India's digital

financial ecosystem.

5. Draft IT (Digital Code) Rules, 2026

Context

India's digital ecosystem has expanded rapidly with the rise of OTT platforms, social media, and user-generated content. While this growth has strengthened freedom of expression, it has also raised concerns related to online obscenity, hate speech, misinformation, and harmful exposure for children. Existing regulation under the Information Technology Act, 2000 and the IT Rules, 2021 has been criticised as insufficient to address evolving digital realities. In response, and following judicial observations by the Supreme Court of India, the Union government has proposed the Draft IT (Digital Code) Rules, 2026 to create a clearer and more standardised framework for regulating digital content.

Q1. Why has the Union government proposed the Draft IT (Digital Code) Rules, 2026, and what regulatory gaps do they seek to address?

1. The draft rules have been proposed to respond to the rapid growth of digital content platforms in India.
2. Existing laws were designed mainly for intermediaries and lacked detailed content classification standards.
3. Repeated controversies around OTT content and social media influencers exposed regulatory ambiguities.
4. Concerns over obscenity, hate speech, and harmful content for children have intensified.
5. Courts have questioned the absence of a structured regulatory mechanism for online content.
6. The government aims to bring consistency across platforms through uniform standards.
7. The draft rules seek to balance creative freedom with social responsibility.

Q2. What is the legal basis of the Draft IT (Digital Code) Rules, 2026, and how do constitutional principles guide their formulation?

1. The draft rules are proposed under Section 87(1) of the Information Technology Act, 2000.
2. They draw authority from Sections 67, 67A, and 67B dealing with obscene and sexually explicit content.
3. These sections already criminalise extreme forms of online obscenity.
4. The rules also reflect constitutional requirements under Article 19(1)(a).
5. At the same time, they recognise reasonable restric-

tions under Article 19(2).

6. The objective is to protect morality, decency, and public order.
7. Judicial guidance has emphasised balancing free speech with social harm prevention.

Q3. How do the Draft IT (Digital Code) Rules define "obscene content," and why is this definition significant?

1. The draft adopts definitions similar to those used in television regulation.
2. Content is considered obscene if it is lascivious or appeals to prurient interests.
3. Material that tends to deprave or corrupt viewers is included.
4. This definition expands scrutiny beyond explicit sexual content.
5. It allows regulators to examine intent and impact on audiences.
6. Such a broad definition increases the scope of content regulation.
7. It also raises concerns about subjective interpretation.

Q4. What categories of content are proposed to be prohibited under the Draft IT (Digital Code) Rules, 2026?

1. Content attacking religions, communities, caste, or nationality is prohibited.
2. Material promoting communal hatred or violence is restricted.
3. Defamatory and deliberately misleading content is covered.
4. Content that denigrates women, children, or persons with disabilities is barred.
5. Presentation of crime, obscenity, or violence as desirable is restricted.
6. Explicit language or scenes aimed at children are prohibited.
7. These provisions significantly widen regulatory oversight.

Q5. What is the mandatory age-based classification system proposed under the draft rules, and how will it function?

1. All digital content must be classified into age categories.
2. Categories include U, 7+, 13+, 16+, and adult-only content.
3. Special categories are created for professional audiences.
4. Content must display age ratings prominently.

5. Content descriptors such as violence or nudity must be shown.
6. The system mirrors film certification practices.
7. It aims to help users make informed viewing choices.

Q6. What new obligations do the draft rules impose regarding parental controls and age verification?

1. Platforms must provide parental controls for content rated 13+ and above.
2. Adult-only content requires reliable age verification mechanisms.
3. Platforms must ensure children cannot easily bypass safeguards.
4. This increases technical and compliance responsibilities for platforms.
5. Social media intermediaries are also covered.
6. The aim is to protect minors from harmful exposure.
7. Compliance costs may rise for digital service providers.

Q7. How will the Draft IT (Digital Code) Rules be enforced, and what is their relationship with the existing IT Rules, 2021?

1. The IT Rules, 2021 will continue to apply alongside the new draft code.
2. Online Curated Content Providers will remain accountable.
3. The draft introduces clearer civil consequences for violations.
4. Enforcement mechanisms rely on self-regulation and oversight.
5. Grievance redressal systems remain mandatory.
6. Platforms may face penalties for non-compliance.
7. The framework strengthens regulatory supervision.

Q8. What concerns have been raised by OTT platforms and other stakeholders regarding the proposed rules?

1. OTT platforms argue that digital content differs from television broadcasting.
2. OTT operates on a user-choice model rather than forced viewing.
3. Applying broadcast-era standards may restrict creative freedom.
4. Broad definitions may encourage frivolous complaints.
5. Subjective terms could lead to regulatory uncertainty.
6. Innovation and investment may be discouraged.
7. Stakeholders seek clearer safeguards against misuse.

Q9. What is the broader significance of the Draft IT (Digital Code) Rules, 2026, for digital governance and society in India?

1. The rules aim to protect children and vulnerable users.
2. They seek to standardise digital content regulation.
3. Judicial concerns over online obscenity are addressed.
4. The framework strengthens accountability of digital platforms.
5. It reflects the state's evolving role in digital governance.
6. At the same time, it tests limits of free expression.
7. The outcome will shape India's digital public sphere.

Conclusion

The Draft IT (Digital Code) Rules, 2026 represent a major attempt to bring structure and clarity to India's rapidly evolving digital content ecosystem. By introducing mandatory age classification, defining obscenity, and strengthening platform accountability, the government seeks to protect social values and vulnerable audiences. However, ensuring that regulation does not stifle creativity or innovation will be crucial. The final impact of these rules will depend on transparent implementation, precise definitions, and a careful balance between freedom and regulation in India's digital future.

6. Delhi Riots Case

1. Background of the Case

- a. In **December 2019**, as the **Citizenship Amendment Act** was **passed**, many people started protesting and the **protests spread throughout the country**.
- b. In **2020**, these protests led to the **Delhi riots** resulting in **widespread violence, loss of lives, and destruction of property**.
- c. Following the riots, an investigation was conducted, after which **several accused** were **arrested and charged**, including under provisions of the **Unlawful Activities (Prevention) Act**, for their **alleged roles in the conspiracy** behind the violence.
- d. In **January 2026**, the Supreme Court **granted bail to five of the seven** accused.
- e. But it did **not grant bail to two accused** (Umar Khalid and Sharjeel Imam) as it held that bail must be based on **individualised assessment of culpability**, not blanket parity with co-accused.

2. Framework Adopted by the Court

- a. The judgment clarified how courts should **assess differentiated roles** in a conspiracy, interpret the **meaning** of a **"terrorist act"** under the **UAPA**, and **balance delay in trial** against the **statutory bar on bail**.
- b. The Court held that **all accused cannot be treated alike**.

- c. It **categorized** the accused into **two groups**:
- i. **Architects** or **ideological drivers** (master-minds), and
 - ii. **Facilitators** or **site-level executors**.
- d. The **five accused who were granted bail** were characterised as **local-level facilitators** with **derivative roles** and lacked **autonomous decision-making authority**.
- e. The **other two accused** were described as **ideological drivers** who allegedly planned to convert protests into **chakka jams** and **road blockades** to **paralyse** the city.
- f. Therefore, the court held that they **do not have bail parity** with the co-accused and **denied their bail**.

3. How the Court Applied the Law?

- a. **Interpretation of ‘Terrorist Act’ under UAPA (Section 15)**
- i. The Court rejected the argument that only use of weapons qualifies as terrorism.
 - ii. It held that a terrorist act can be committed by **“any other means of whatever nature”**, if it threatens **economic security**, or disrupts **essential services**.
 - iii. Sustained blocking of arterial roads and systemic disruption of civic life were held to be **prima facie terrorist acts**, especially when timed with international events such as the **2020 visit of the U.S. President**.
- b. **Statutory Bar on Bail (Section 43D(5), UAPA)**
- i. Bail is barred if accusations appear **prima facie true**.
 - ii. The Court found **sufficient material** (witness statements, WhatsApp chats, meeting records) to establish a **prima facie conspiracy** against Khalid and Imam.
 - iii. Therefore, the statutory bar operated fully against them.
- c. **Prolonged Incarceration Argument**
- i. The accused relied on **Union of India v. K.A. Najeed (2021)**, where bail was granted due to trial delay.
 - ii. The Court clarified that **delay is not an automatic trump card**.
 - iii. Delay only triggers **heightened judicial scrutiny**, not automatic release.
 - iv. In this case delay was partly due to **voluminous evidence** (1,000+ documents, 835 witnesses) and procedural objections raised by the defence.
 - v. For alleged masterminds, **gravity of offence outweighed delay**.

4. Implications of the Judgment

- a. Establishes **role-based bail assessment** in conspiracy cases.
- b. Expands the **scope of ‘terrorist act’** beyond physical violence.
- c. Reinforces the **strict bail regime under UAPA**.
- d. Clarifies limits of **Article 21-based bail** in national security cases.
- e. Signals judicial caution against treating prolonged incarceration as an automatic ground for bail.

Conclusion

The Supreme Court’s ruling reinforces a **graduated approach to culpability**, where liberty depends on the **nature and centrality of one’s role**. While protecting national security, the judgment underscores the need for faster trials and careful calibration between state power and individual rights.

7. Right to Disconnect in India

Context

1. The problem of **work-related stress, long working hours, and digital overreach** is increasing in India, leading to more debates on **‘right to disconnect’** after work.
2. In **December 2025**, a **private member’s bill** was introduced in **Lok Sabha** to legally recognize this right by amending the **Occupational Safety, Health and Working Conditions Code, 2020**, following global trends and recent State-level initiatives such as in Kerala.

Q1. What is the Right to Disconnect?

1. It means that an employee is **not required to respond to work-related calls, emails, or messages beyond official working hours**, and cannot be penalised for doing so.
2. Its purpose is to **restore the boundary between work and personal life**, protect **mental and physical health**, and prevent **burnout** in a digitally connected economy.
3. In an **“always-on” work culture**, smartphones, laptops, and instant communication tools have **blurred work-life boundaries**, turning evenings, weekends, and holidays into **unpaid extensions of the workday**.

Q2. Why is the Right to Disconnect Needed in India?

1. According to the **International Labour Organization**, **51% of India’s workforce works more than 49 hours per week**, placing India **second globally** in extended working hours.
2. **78% of Indian employees report job burnout**, leading to physical and emotional exhaustion.

3. Overwork contributes to **hypertension, diabetes, anxiety, and depression**, increasing pressure on the healthcare system.
4. Work-related stress accounts for **10-12% of mental health cases**, as per the **National Mental Health Survey**.
5. The **death of Anna Sebastian Perayil (2024)** highlighted the extreme human cost of overwork.
6. Productivity based on **long hours rather than quality of work** is inefficient and outdated.
7. Fear of disciplinary action for not responding after hours creates an **unequal power relationship** between employers and employees.

Q3. How India's Current Legal Framework Falls Short?

1. The **Occupational Safety, Health and Working Conditions Code, 2020** limits working hours mainly for traditional "workers".
2. It often **does not adequately cover employees**, especially:
 - a. Contractual workers
 - b. Freelancers
 - c. Gig-economy workers
3. This leaves a large, young, and digitally connected workforce **unprotected from excessive work demands**.

Q4. How the Proposed Reform Seeks to Address the Problem?

The proposed Bill aims to amend the existing labour code to:

1. **Clearly define and limit working hours for all employees**, not just traditional workers.
2. **Legally guarantee the right to disconnect**, ensuring that employees:
 - a. Are not penalised for ignoring work communications after hours.
 - b. Have access to grievance-redress mechanisms if their rights are violated.
3. Treat the right to disconnect as a part of **occupational safety and mental health protection**, not merely a workplace privilege.

Q5. What are the Global Practices and Lessons for India?

1. The right to disconnect is a **global labour issue**, not unique to India.
2. Countries that have adopted similar laws include: **France** (pioneer, 2017), **Portugal, Italy, Ireland and Australia**.
3. These laws require companies to set **clear protocols for after-hours communication**, showing

that respecting rest time supports **sustainable economic growth**, not productivity loss.

Q6. What are the other interconnected steps that need to be taken to make this legislation effective?

1. Run **comprehensive awareness and training programmes** to educate both employees and managers about healthy work practices and the right to disconnect.
2. **Change workplace culture** by discouraging practices that value long working hours or late-night emails over actual quality of work and productivity.
3. **Make mental health support a regular part of workplaces**, by providing counselling and psychological support services for employees.

Implications

1. Improves **employee mental and physical health**.
2. Enhances **long-term productivity and creativity**.
3. Reduces healthcare and social costs linked to stress-related illnesses.
4. Strengthens **labour rights** in the digital economy.
5. Helps India leverage its **demographic dividend** sustainably.

Conclusion

Recognising the right to disconnect is essential to protect worker well-being in India's digital economy. A uniform national framework, supported by cultural change and mental health safeguards, can create a healthier, more productive, and sustainable workforce for the future.

8. Cadre Allocation Reform

Context

The Union government has **revised the cadre allocation policy** for **All India Services**, replacing the **zonal system** with an **alphabetical grouping framework** to improve **transparency, fairness, and national integration**.

Q1. What is cadre allocation and why is it important in All India Services?

1. **Cadre allocation** determines the State or Joint Cadre in which IAS, IPS, and IFoS officers serve.
2. It is **central** to:
 - a. **National integration** through inter-State exposure.
 - b. **Administrative neutrality** by limiting regional and local biases.
 - c. **Federal balance** by ensuring equitable officer distribution across States.
 - d. **Effective governance**, as officers spend

most of their careers within a single cadre.

Q2. How did the earlier zonal system work and why was it criticised?

1. Under the **2017 policy**, States were grouped into **five geographical zones**.
2. Candidates **ranked zones** and then cadres within them.
3. However:
 - a. States flagged **uneven officer distribution** and **cadre skewness**.
 - b. Aspirants raised **concerns** about **opacity** and **rigidity**.
 - c. Geographical clustering often resulted in **regional concentration**, diluting the integration objective.

Q3. What is the new grouping-based cadre allocation structure?

1. The revised policy **replaces zones** with **four alphabetical groups** of State and Joint Cadres.
2. Cadres are **evenly distributed** across groups without geographical logic.
3. This aims to **standardise preferences**, reduce discretion, and ensure wider inter-State exposure.

Q4. What are the objectives of the revised cadre allocation policy?

1. The reform seeks to:
 - a. **Enhance transparency** by removing subjective zonal preferences.
 - b. **Ensure fairer distribution** of officers across States.
 - c. **Promote national integration**, a core rationale of All India Services.
 - d. **Improve administrative efficiency** through predictable allocation rules.

Q5. How are vacancies determined under the new policy?

1. **Vacancies** are **calculated annually** based on cadre gaps as on January 1.
 - a. IAS: Department of Personnel and Training.
 - b. IPS: Ministry of Home Affairs.
 - c. IFoS: Ministry of Environment, Forest and Climate Change.
2. States **must submit vacancy requisitions** by January 31, failing which they are excluded.
3. **Vacancy data** will be **publicly disclosed** to ensure transparency.

Q6. What changes have been made in insider-outsider allocation rules?

1. **Insider allocation** is strictly **merit-based** and subject to **vacancy availability**.
2. **Willingness** to serve in the **home State** is now **mandatory** for **insider eligibility**.
3. **EWS vacancies** are treated as part of the **unreserved category** for cadre allocation.
4. These measures **aim to limit discretion** and **reinforce equality** in allocation.

Q7. What is the rotational cycle system and why was it introduced?

1. A **new rotational cycle of 25 candidates** (equal to total cadres) has been introduced.
2. **Higher-ranked candidates** in a cycle get **priority**.
3. **Unallocated candidates** move to the **next cycle**.
4. **Outsider allocation** follows **insider placement**, with priority for PwBD candidates.
5. This system **enhances objectivity, predictability, and uniformity**.

Q8. Why is the revised cadre allocation policy significant for governance?

It is expected to:

1. **Reduce litigation** and **administrative grievances**.
2. **Address long-standing State concerns**, strengthening **cooperative federalism**.
3. **Improve officers' exposure** to diverse administrative environments.
4. **Align recruitment practices** with **governance efficiency** and **institutional credibility**.

Q9. What are the challenges and the way forward?

1. **Challenges include:**
 - a. **Resistance from States** perceiving loss of influence.
 - b. **Adjustment concerns** among aspirants accustomed to zonal preferences.
 - c. **Implementation consistency** across services and years.
2. **Way forward requires:**
 - a. **Continuous review** of allocation outcomes.
 - b. **Transparent communication** with States and candidates.
 - c. **Data-driven fine-tuning** to balance equity, efficiency, and federal trust.

Conclusion

The revised cadre allocation policy **strengthens transparency, integration, and federal balance**. Its success will depend on fair implementation, stakeholder confidence, and **sustained alignment** with the **constitutional ethos** of All India Services.

9. Protective Custody under PITA

Context

The **Bombay High Court** set aside an order that placed an **adult trafficking survivor** in a **protective home** for one year. The Court held that **detaining an adult survivor without consent** or constitutional justification **violates personal liberty**. It clarified that **protective homes** under the **Immoral Traffic (Prevention) Act, 1956 (PITA)** are meant for **rehabilitation and care**, not confinement.

Q1. What triggered the Bombay High Court's intervention?

1. The case arose from a **police raid** in Maharashtra related to trafficking.
2. Only **one adult woman** was placed in a **protective home** for a year.
3. The justification given was that:
 - a. She **lacked family support**.
 - b. She had **no independent income**.
 - c. There was a **possibility** she might **return to sex work**.
4. The woman repeatedly **expressed her desire to leave** the protective home.
5. The High Court found these **assumptions legally impermissible and constitutionally untenable**.

Q2. What does the Immoral Traffic (Prevention) Act allow after rescue?

1. **Section 17 of PITA** permits **temporary safe custody** only in **limited circumstances**.
2. Initial custody without producing the person before a magistrate:
 - a. Permissible only if immediate production is not possible.
 - b. Capped at a **maximum of 10 days**.
3. Once produced before a magistrate:
 - a. A **formal inquiry** is mandatory.
 - b. **Interim custody** during inquiry can extend up to **three weeks**.
4. The **statutory time limits** reflect legislative intent to **prevent indefinite confinement**.

Q3. When is long-term placement in a protective home legally permissible?

1. Placement for one to three years is allowed only if:
 - a. The magistrate conducts a **proper inquiry**.
 - b. A **clear finding** is recorded that the person is "in need of care and protection."
2. Such placement is **not automatic after rescue**.
3. The Court emphasised that **rescue cannot become a gateway to prolonged detention**.

Q4. How does PITA distinguish between protective homes and detention?

1. PITA makes a **clear legal distinction**:
 - a. **Protective homes (Section 2(g))**: Intended for care, rehabilitation, and voluntary support of victims.
 - b. **Corrective institutions (Section 2(b) read with Section 10A)**: Intended for detention of offenders convicted under the Act.
2. Only persons **found guilty of offences** can be sent to corrective institutions.
3. **Victims of trafficking cannot** be treated as **offenders by default**.

Q5. What constitutional rights of adult survivors did the Court emphasise?

1. Adult survivors retain **full constitutional freedoms**, including:
 - a. Right to personal liberty under **Article 21**.
 - b. Freedoms under **Article 19**, such as:
 - i. Freedom of movement.
 - ii. Choice of residence.
 - iii. Right to pursue a livelihood.
2. Unlike children, adults cannot be subjected to extended state control merely for "**protection**."
3. Trafficking does **not suspend or dilute constitutional rights**.

Q6. Why did the Court place consent at the centre of 'care'?

1. The Court held that:
 - a. **Care** for an adult must be **voluntary**.
 - b. **Consent** is the **defining element** distinguishing care from detention.
2. Once an adult clearly expresses a desire to leave, continued confinement becomes unlawful detention.
3. **In this case**:
 - a. The woman repeatedly refused to stay.

- b. Her **consent** was **absent** and could not be presumed.

Q7. How did the Court distinguish between care and detention?

1. The Court adopted a **substance-over-label approach**.
2. **Care involves:**
 - a. Voluntary shelter.
 - b. Counselling and rehabilitation with consent.
 - c. Support for rebuilding life choices.
3. **Detention involves:**
 - a. Compulsion.
 - b. Restrictions on movement and autonomy.
4. If an adult is confined against her wishes:
 - a. The arrangement amounts to detention.
 - b. Such detention **must meet strict constitutional standards**.

Q8. What role does the magistrate play under PITA?

1. Only a **magistrate** can determine whether: A rescued person genuinely requires care and protection.
2. This **determination** must follow:
 - a. A **proper inquiry**.
 - b. Application of mind to **individual circumstances**.
3. **Administrative or police assumptions** cannot substitute judicial satisfaction.

Q9. When can detention of an adult survivor be justified?

1. The Court identified **limited situations** where detention may be permissible:
 - a. **Medical evidence** showing **impaired decision-making** capacity.
 - b. A **demonstrable threat** to society if the person is released.
 - c. The individual being an **accused in a criminal offence**.
2. Absent these conditions, detention lacks legal basis.

Q10. Why did detention fail the legal test in this case?

1. There was **no medical evidence** of incapacity.
2. There was **no finding** that the woman posed a **danger** to others.

3. She was **not an accused** in any criminal case.
4. The **fear** that she might return to sex work was **speculative**.
5. Speculation and moral assumptions **cannot justify curtailment of liberty**.

Q11. What conduct does PITA actually criminalise?

1. **Prostitution per se** is **not a crime** under PITA.
2. The **Act targets:**
 - a. Commercial sexual exploitation.
 - b. Systems and actors who profit from or facilitate exploitation.
3. **Criminal liability** arises for:
 - a. Running or managing a brothel.
 - b. Living off earnings of another's prostitution.
 - c. Procuring or trafficking persons, even with apparent consent.
 - d. Detaining persons for sexual exploitation.
4. Some acts are **punishable only when they affect public order**, such as soliciting near schools or hospitals.

Q12. Why did the Court reject poverty as a ground for detention?

1. The Court categorically held that:
 - a. **Economic vulnerability** does not justify confinement.
 - b. **Lack of family support or income** cannot override liberty.
2. Poverty may warrant:
 - a. Welfare assistance.
 - b. Rehabilitation support.
3. It can never justify:
 - a. Forced custody.
 - b. Loss of autonomy.

Conclusion

The Bombay High Court reaffirmed that trafficking survivors are rights-bearing individuals, not subjects of state control. Protective custody under PITA must remain exceptional, time-bound, and consent-based for adults. The judgment strengthens constitutional liberty, victim-centric justice, and prevents rescue from turning into punishment.

10. UGC Regulations, 2026

Context

In recent years, Indian higher education campuses have witnessed increasing concerns related to caste-based

discrimination, exclusion, and lack of effective grievance redressal. While constitutional guarantees of equality exist, institutional mechanisms often remain weak or symbolic. Against this backdrop, the **University Grants Commission** notified the *Promotion of Equity in Higher Education Institutions Regulations, 2026*. These regulations aim to create safer, fairer, and more inclusive academic environments by placing enforceable obligations on universities and colleges to prevent discrimination and promote equal opportunity.

Q1. What is the University Grants Commission (UGC), and why is it central to regulating equity and standards in higher education in India?

1. The University Grants Commission is a statutory body responsible for coordination, funding, and maintenance of standards in higher education.
2. It ensures uniform quality and systematic development of universities across India.
3. The idea of a national higher education regulator originated in the Sargeant Report, 1944.
4. The UGC evolved from earlier committees and was formally established as a statutory body in 1956.
5. It allocates grants, advises governments, and frames regulations binding on universities.
6. Through regulations, the UGC shapes academic standards and campus governance.
7. Its authority makes it a key instrument for enforcing equity and inclusion norms nationwide.

Q2. Why did the Union government notify the UGC (Promotion of Equity in Higher Education Institutions) Regulations, 2026, and what problems do they seek to address?

1. The regulations were notified to address persistent discrimination and exclusion on campuses.
2. Existing mechanisms such as SC/ST Cells lacked enforcement power and autonomy.
3. Several incidents exposed institutional apathy toward caste-based and social discrimination.
4. Marginalised students faced psychological distress, higher dropout rates, and isolation.
5. There was no uniform national framework ensuring equity across institutions.
6. The new regulations convert equity from a moral obligation into a legal duty.
7. They aim to make campuses safer, fairer, and more accountable.

Q3. How do the 2026 Regulations define discrimination, and why is the expanded definition significant for Indian campuses?

1. The regulations define discrimination broadly as any unfair or biased treatment.
2. Both direct and indirect forms of discrimination are covered.
3. Grounds include caste, religion, race, gender, disability, and place of birth.
4. Acts undermining dignity or equality in education are included.
5. This goes beyond narrow legal definitions of overt discrimination.
6. It captures subtle, structural, and institutional forms of exclusion.
7. The broader definition improves access to justice for victims.

Q4. What provisions have been introduced to address caste-based discrimination, and why is the inclusion of OBCs important?

1. The regulations explicitly recognise caste-based discrimination as a serious violation.
2. Protection is extended to SCs, STs, and for the first time clearly to OBCs.
3. Earlier frameworks often focused only on SC/ST communities.
4. Inclusion of OBCs closes a major policy gap.
5. It reflects social realities of discrimination beyond constitutionally listed groups.
6. The provision strengthens legal clarity and campus accountability.
7. It aligns institutional rules with constitutional principles of social justice.

Q5. What is the role of the Equal Opportunity Centre (EOC) under the new UGC rules, and how does it strengthen institutional equity?

1. Every higher education institution must establish an Equal Opportunity Centre.
2. The EOC acts as the nodal body for promoting inclusion and fairness.
3. It handles complaints related to discrimination and exclusion.
4. The centre conducts awareness and sensitisation programmes.
5. It protects complainants from retaliation and victimisation.
6. Welfare schemes and academic support are coordinated through the EOC.
7. The EOC institutionalises equity rather than treating it as ad hoc concern.

Q6. How is the Equity Committee constituted under the 2026 Regulations, and why is its

composition crucial?

1. Each institution must constitute an Equity Committee under the EOC.
2. The head of the institution acts as the ex-officio chairperson.
3. Senior faculty, staff members, and civil society representatives are included.
4. Student representatives are invited based on merit and performance.
5. Mandatory representation is required for SCs, STs, OBCs, women, and persons with disabilities.
6. Inclusive composition ensures diverse perspectives in decision-making.
7. It reduces institutional bias and strengthens credibility of outcomes.

Q7. What reporting, monitoring, and accountability mechanisms are provided under the new UGC Regulations?

1. Equal Opportunity Centres must submit bi-annual reports.
2. Institutions are required to file annual equity compliance reports with the UGC.
3. These reports enhance transparency in institutional functioning.
4. The UGC will establish a national monitoring committee.
5. The committee will review complaints and systemic issues.
6. It will meet at least twice a year.
7. This creates continuous oversight rather than reactive intervention.

Q8. What penalties and enforcement measures are prescribed for non-compliance by higher education institutions?

1. The regulations prescribe strict penalties for violations.
2. Institutions may be debarred from UGC funding schemes.
3. Restrictions may be imposed on degree, distance, or online programmes.
4. Persistent non-compliance can lead to withdrawal of UGC recognition.
5. These sanctions make the rules legally enforceable.
6. Institutions are incentivised to implement reforms seriously.
7. Compliance is no longer voluntary or symbolic.

Q9. What is the broader constitutional and social**significance of the UGC Equity Regulations, 2026, for Indian higher education?**

1. The regulations operationalise constitutional guarantees of equality and dignity.
2. They strengthen Articles 14, 15, 16, and 46 in the education sector.
3. Campus equity supports social mobility and democratic inclusion.
4. Effective grievance redressal builds trust in institutions.
5. The rules address historical disadvantages faced by marginalised groups.
6. They promote inclusive excellence rather than exclusionary merit.
7. Overall, they redefine higher education as a space of justice and fairness.

Conclusion

The UGC (Promotion of Equity in Higher Education Institutions) Regulations, 2026 mark a decisive shift in India's higher education governance—from symbolic commitments to enforceable equity. By mandating Equal Opportunity Centres, inclusive Equity Committees, strict reporting, and real penalties, the regulations strengthen constitutional values on campuses. If implemented sincerely, they can transform universities into truly inclusive spaces, reduce discrimination-induced dropouts, and ensure that higher education becomes a genuine instrument of social justice and national development.

11. Section 17A and Corruption Control**Context**

A two-judge Bench of the Supreme Court has delivered a **split verdict** on the constitutional validity of **Section 17A of the Prevention of Corruption Act, 1988 (PCA)**. The provision mandates **prior government approval before initiating investigation** against public servants for decisions taken in official capacity.

Q1. What is the Prevention of Corruption Act, 1988?

1. The PCA, 1988 is India's primary law to combat corruption among public servants.
2. It has its origins in the recommendations of the **Santhanam Committee (1962-64)**, which highlighted the need to strengthen anti-corruption laws.
3. The Act consolidates laws relating to:
 - a. Bribery
 - b. Obtaining undue advantage
 - c. Criminal misconduct by public servants
4. **"Public servant"** under the Act has a **wide scope**, covering government employees, local authority officials, judges, and others performing public duties.

5. “**Public duty**” refers to duties in which the State, public, or community has an interest.

Q2. What does Section 17A of the PCA mandate?

1. **Section 17A** was inserted through the **2018 amendment** to the PCA.
2. It requires **prior approval of the appropriate government** before any police inquiry or investigation is initiated against a public servant.
3. This **applies** only when:
 - a. The alleged offence relates to a **recommendation made or decision taken**
 - b. The act was done **in discharge of official functions or duties**
4. The **objective** behind introducing Section 17A was:
 - a. To **protect honest officers** from harassment
 - b. To **prevent “policy paralysis”** caused by fear of investigation for bona fide decisions

Q3. Why was Section 17A considered necessary by Parliament?

1. Existing safeguards like **Section 19 of the PCA** already require prior sanction before prosecution in court.
2. However, officers argued that:
 - a. Investigations themselves had a **chilling effect**
 - b. Fear of probes discouraged **bold and timely administrative decisions**
3. **Section 17A** was intended to differentiate:
 - a. Malicious or frivolous complaints
 - b. From genuine allegations of corruption

Q4. What have earlier Supreme Court rulings held on prior approval?

1. **Vineet Narain v. Union of India (1998)**:
 - a. The Supreme Court struck down the “Single Directive”.
 - b. This executive order required prior sanction before CBI investigation against senior officers.
 - c. The Court held that executive control over investigations undermined rule of law.
2. **Section 6A of the DSPE Act (2003 amendment)**:
 - a. Introduced prior approval for investigating officers of Joint Secretary rank and above.
3. **Subramanian Swamy v. Director, CBI (2014)**:

- a. The Supreme Court struck down Section 6A.
 - b. It held that:
 - i. Differential treatment based on rank violated **Article 14 (Equality before law)**
 - ii. Even preliminary inquiries should not be obstructed
4. These rulings established that **fetters on investigation**, especially at the threshold stage, are constitutionally suspect.

Q5. What led to the current split verdict on Section 17A?

1. The case arose from a **Public Interest Litigation filed by the Centre for Public Interest Litigation**.
2. The petition challenged Section 17A as unconstitutional and contrary to earlier Supreme Court judgments.
3. The two-judge Bench delivered **divergent opinions**, reflecting fundamentally different readings of constitutional principles and precedent.

Q6. What was Justice K. V. Viswanathan’s view?

1. Justice Viswanathan upheld the **purpose behind Section 17A**.
2. He emphasised that:
 - a. Honest officers form the **“steel frame”** of governance
 - b. Absence of safeguards could promote a **“play-it-safe” bureaucratic culture**
3. However, he identified a **constitutional flaw**:
 - a. Allowing the government itself to grant approval **compromises independence**
4. To save the provision, he adopted a **constructive interpretation**:
 - a. Approval should be granted by the government **based on binding recommendations** of:
 - i. Lokpal (for Central government officials)
 - ii. Lokayuktas (for State government officials)
5. According to him, this would:
 - a. Preserve investigative independence
 - b. Protect honest officers
 - c. Align Section 17A with constitutional requirements

Q7. What was Justice B. V. Nagarathna’s view?

1. Justice Nagarathna held **Section 17A to be un-**

constitutional.

2. She described it as “old wine in a new bottle”, reviving restrictions already struck down earlier.
3. Her key arguments were:
 - a. Section 17A blocks investigation even at the preliminary stage
 - b. This violates the core principles laid down in Vineet Narain and Subramanian Swamy
4. She found it violative of **Article 14** because:
 - a. It protects only decision-makers, not lower-level officials
 - b. There is no rational nexus between the classification and the objective
5. She rejected the idea of judicial reconstruction:
 - a. Courts cannot replace “government” with “Lokpal” in the statute
 - b. Such an exercise amounts to judicial legislation
6. She also held that:
 - a. Adequate protection already exists under Section 19 at the prosecution stage

Q8. Why is the issue now before a larger Bench?

1. The split verdict creates legal uncertainty on:
 - a. Whether Section 17A is valid
 - b. Who can grant approval
2. Given the **constitutional and governance implications**, the matter has been referred to a larger Bench for a final and authoritative ruling.

Q9. What systemic reforms are needed to tackle corruption effectively?

1. **Speedy investigation and trial:**
 - a. Delays weaken deterrence
 - b. Swift punishment increases credibility of anti-corruption law
2. **Penalising false complaints:**
 - a. Malicious and vexatious complaints should attract penalties
 - b. This would discourage abuse of anti-corruption mechanisms
3. **Strengthening independent institutions:**
 - a. Lokpal and Lokayuktas must be operationally strong and autonomous
4. **Balancing accountability with decisional freedom:**
 - a. Honest decision-making should be protected
 - b. Corrupt practices should face prompt and impartial action

Conclusion

The debate over Section 17A reflects a deeper tension between **clean governance** and **administrative efficiency**. While protecting honest officers is essential, placing excessive barriers on investigation risks undermining the fight against corruption. The larger Bench’s decision will be crucial in shaping India’s anti-corruption framework and the balance between **integrity, accountability, and effective governance**.

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INTERNATIONAL RELATIONS

1. NATO, Energy Politics, and De-dollarization

Q1. What is NATO and what were its founding objectives in post-World War II Europe?

1. **NATO (North Atlantic Treaty Organization)** is a **political and military alliance** of North American and European countries, established in **1949** as a collective defence alliance.
2. NATO today has **32 members**, including the US, UK, Canada, most EU states, and non-EU countries like Norway and Turkey. **Finland (2023)** and **Sweden (2024)** are the recent members.
3. **Founding Objectives:**
 - a. **Collective Defence:** Attack on one considered as attack on all (Article 5)
 - b. **Deterring Soviet expansion** and containing communism in post-WWII Europe.
 - c. **Political cooperation and stability** in war-torn Europe, ensuring Western democracies could consult on defence and security.

Q2. How has NATO's role evolved from Cold War deterrence to contemporary relevance?

1. **Cold War deterrence:** Primarily served as a bulwark against Soviet military power in Europe.
2. **Post-Cold War adaptation:** Expanded eastward after 1991, integrating former Warsaw Pact states.
3. **Collective security and crisis management:** NATO has taken roles in out-of-region operations, including in the Balkans and Afghanistan, and humanitarian missions.
4. **Contemporary relevance:** With Russia's invasion of Ukraine, NATO has focused on deterrence on its eastern flank, reinforcing defence commitments, and emphasising collective security in a changing global environment.
5. Also, the initiative of **NATO Plus** (NATO's **informal strategic partnerships with non-member countries**, especially in the **Indo-Pacific**, such as **Japan, Australia, South Korea, and New Zealand**) reflects NATO's shift from a **purely Euro-Atlantic alliance** to a body engaging with **global security challenges** like crisis management, cyber security, and political consultation on wider global security threats.

Q3. How do GDP size, GDP per capita, and defence spending reveal disparities within NATO, and how does US dominance shape alliance dynamics?

1. **Economic and defence disparities:**
 - a. The **United States' GDP** exceeds the GDP of all other NATO members, reflecting its outsized economic capacity relative to the rest of the bloc.
 - b. The US also leads in **GDP per capita**, indicating stronger fiscal capacity for defence spending.
 - c. Many European NATO states spend less than the alliance's guideline of **2% of GDP on defence**, whereas the US spends significantly more in absolute and relative terms.
2. **Impact on alliance dynamics:**
 - a. **US economic strength enables larger defence budgets**, higher force projection, and leadership in coalition operations.
 - b. Other members often rely on the US for capabilities such as nuclear deterrence and strategic mobility.
 - c. This economic and military asymmetry grants the US **disproportionate influence** over NATO priorities and decision-making, shaping strategic objectives and burden-sharing debates.
3. Thus, the US **dominates NATO's military culture and resource allocation**, while smaller economies play **more limited roles in collective defence**.

Q4. What institutional checks within NATO help limit unilateral US moves despite being a dominant member?

1. **Institutional checks within NATO:**
 - a. **Consensus-based decision-making:** All NATO decisions require agreement by all member states via bodies such as the **North Atlantic Council**.
 - b. **Article 5 commitments** bind members equally, preventing unilateral military action in the alliance's name.
 - c. Member states retain **sovereign control**

over their forces and foreign policies, imposing limits on any one state's unilateral actions.

2. Thus, while the US has significant informal leverage, NATO's **institutional framework prevents unilateral decisions**, requiring collective agreement even if one member is dominant.

Q5. What would be the legal and strategic implications of a hypothetical US takeover of Greenland for NATO cohesion and international law?

1. Following **US actions in Venezuela**, senior US officials also publicly stated that **Greenland** should become **US territory**, despite it being an **autonomous territory** of **Denmark**, a fellow NATO member.
2. This raised serious concerns about **alliance cohesion**, respect for **sovereignty** among NATO members, and the **credibility** of NATO's **collective security principles**.
3. **Legal implications:**
 - a. A **forcible takeover of Greenland**, a territory of NATO member Denmark, would violate **sovereignty principles under international law** and the UN Charter.
 - b. It would undermine the core principle that alliance members respect each other's territorial integrity.
4. **Strategic implications:**
 - a. Such an act could **fracture alliance unity**, pitting the US against a fellow member (Denmark).
 - b. It would create a **crisis of trust** within the alliance and potentially erode collective security commitments.
 - c. NATO's **credibility as a security organisation** based on **shared values** and **international norms** would be severely damaged.

Q6. What is the petrodollar system, how did it emerge, and why does dollar-denominated oil trade strengthen US financial influence?

1. **US sanctions on Russian oil** (tariffs up to 500%), actions in **Venezuela** and claims over **Greenland** indicate a **broader strategic approach** centred on **energy dominance** and safeguarding the **petrodollar-based global oil trade**.
2. The **petrodollar system** refers to the use of the **US dollar for pricing and settling** international oil trade.
3. **Emergence:** After the end of the **Bretton Woods**

gold-backed dollar in the early 1970s, the US and Saudi Arabia agreed to price oil in dollars, encouraging other OPEC exporters to follow.

4. It **strengthens** US financial influence as:
 - a. Global oil trade in dollars **maintains constant demand** for the currency, reinforcing its status as the principal global reserve currency.
 - b. Oil importers must **hold and use dollars**, strengthening US financial markets, **lowering borrowing costs**, and giving the **US monetary leverage** in international trade.
5. Thus, **sanctions** and **energy policy** are **not only punitive** but also linked to **sustaining US financial leadership** and the **international role of the dollar**.

Q7. How do China and India's alternative oil-trade practices and China's EV dominance together advance de-dollarization and weaken the petrodollar system?

De-dollarization refers to the process by which countries **reduce their dependence on the US dollar** in international trade, finance, and reserves by using **alternative currencies, payment systems, or settlement mechanisms**.

1. **India**
 - a. Has paid for some **Russian crude oil in yuan**, signalling **currency diversification**.
 - b. Seeks alternative settlement mechanisms to reduce exposure to **dollar sanctions and exchange risks**.
2. **BRICS**
 - a. Exploring **parallel currency arrangements and payment systems**. (Eg: BRICS local-currency settlements)
 - b. Aims to reduce collective dependence on the US dollar in trade and finance.
3. **China**
 - a. Uses the **yuan for energy trade**, including oil imports, promoting the **internationalisation of the renminbi**.
 - b. Introduced **petroyuan contracts**, offering an alternative to dollar-denominated oil trade.
 - c. Encourages sanctioned countries (e.g., Russia, Iran) to accept **non-dollar settlements**.
4. **China's dominance** in electric vehicles and clean-energy supply chains **reduces long-term oil demand**, thereby **weakening oil-based dollar trade** and **reinforcing global de-dollarization trends**.

2. Shadow Fleet Crackdown

Q1. What is a Shadow/Opaque fleet and what are its two broad categories of vessels (Dark and Grey)?

1. The shadow fleet is a large group of oil tankers (3,000+ ships) that deliberately hide their identity to transport oil from countries under US/EU sanctions (Iran, Russia, Venezuela).
2. The West has banned these countries from selling, but these sanctioned countries still earn “black money” to fund their governments, and militaries.
3. The shadow fleet is divided into **dark fleet and grey fleet**.
4. **Dark Fleet Vessels** know they are carrying sanctioned oil and intentionally hide what they are doing for deliberate sanctions evasion.
5. **Grey Fleet Vessels** pretend to be legal but are not officially sanctioned. They use odd routes, frequent ownership changes, risky ports and vague company structures for enabling sanctioned trade.

Q2. Why is the US cracking down on Shadow Fleets, and why does it consider this strategically important?

1. The US wants to **stop Iran, Russia, and Venezuela** from earning oil money that funds Iran’s **military and missile/drone programs**, Russia’s **war** in Ukraine, & Venezuela’s **authoritarian regime**.
2. The US wants to **protect its own sanctions policy** because if shadow fleets keep working, its sanctions become useless.
3. The US wants to **reduce global oil price manipulation and illegal trade** that distorts markets.
4. Countries like India and China buy discounted oil from these shadow fleets. The US warns that dealing with these ships can **bring secondary sanctions** on their banks/companies also.
5. Shadow fleets **undermine international rules, create unsafe shipping** (old ships), and **increase oil spills and accidents**.

Q3. What methods do Shadow Fleet vessels use to evade detection and sanctions?

1. **Turn off tracking (AIS off):** They switch off their Automatic Identification System (AIS), so their real location disappears from public maps.
2. **Spoof GPS / fake location:** They send fake GPS signals to show they are somewhere else (show in the Pacific but they are actually near Iran).
3. **Flag changes:** They keep changing their country of registration (flag) to places with weak rules, making it hard to know who really owns them.

4. **Ship-to-ship transfers (STS):** They transfer oil from one tanker to another at middle sea (not at ports), so the oil’s origin is hidden.
5. **Complex ownership:** The real owners hide behind layers of shell companies in tax havens, making it hard to trace who actually owns the ship.

Q4. What tools and mechanisms is the US using to curb Shadow Fleet operations?

1. **Sanctions:** The US Treasury (OFAC) puts these tankers and their owners on a “blacklist.” Once sanctioned, no bank, insurer, or port in the world can legally deal with them. In early 2026, the US sanctioned nearly many Iranian tankers and shipping firms.
2. **Seizing tankers:** The US Navy or Coast Guard physically seizes (captures) these tankers when they are in international waters or friendly ports. In early 2026, the US seized 4 shadow fleet tankers (Marinera, Sophia, Centuries, Skipper) carrying Iranian and Venezuelan oil.
3. **Tracking:** The US uses satellite data, AIS monitoring, and intelligence to spot suspicious ships (AIS off, spoofing, dark STS transfers). The US shares this data with allies (EU, UK, Japan) to coordinate seizures.
4. **Targeting the whole network:** The US doesn’t just target ships; it also sanctions Shipping companies, Insurers and banks, Middlemen and traders dealing with them. It also pressures countries not to let these tankers enter their ports or buy the oil.

Q5. Which countries and shipping networks are the primary targets of the U.S. crackdown?

1. **Iran’s shadow fleet** that carries Iranian crude oil to China and other Asian buyers, bypassing US sanctions earning dollars to fund the IRGC and weapons programs.
2. **Russia’s shadow fleet:** After the Ukraine war, Russia built a huge fleet of old tankers to export oil to India, China, and Africa at discounted prices. The US is now pushing new laws to expand sanctions on this “illicit shadow fleet” to cut off Putin’s war funding.
3. **Venezuela’s shadow fleet:** Tankers that move Venezuelan oil to China.

Q6. Why is it difficult to completely eliminate Shadow Fleets despite enforcement efforts?

1. New ships, new routes and new middlemen appear.
2. Russia, China, Iran strongly oppose the US crackdown, calling it “illegal”.

3. Some countries (India) quietly continue buying this cheap oil while avoiding direct confrontation.
4. Risk of escalation as seizing tankers in international waters can lead to naval standoffs or diplomatic crises.

3. India–UAE Relations

Context

Against the backdrop of escalating geopolitical tensions in West Asia—including the Gaza conflict, instability in Yemen, unrest in Iran, and growing Saudi–Pakistan defence cooperation—India and the **United Arab Emirates** have further deepened their **Comprehensive Strategic Partnership**.

During the visit of UAE President **Sheikh Mohamed bin Zayed Al Nahyan** to New Delhi, both sides signed a **Letter of Intent (LoI) for a Bilateral Strategic Defence Partnership**. The visit underscores India's calibrated diplomacy in a region marked by rivalries, while reaffirming the UAE's role as a key energy supplier, investment partner, and strategic interlocutor.

Q1. Why is the signing of a Strategic Defence Partnership between India and the UAE significant in the current West Asia geopolitical context?

1. The agreement comes amid **heightened instability** in West Asia, including conflicts in Gaza and Yemen.
2. **Strategic significance:**
 - a. Signals trust and long-term intent beyond transactional ties
 - b. Enhances defence dialogue without formal alliance obligations
 - c. Offers UAE strategic diversification beyond traditional partners
3. It reflects India's growing role as a **credible security partner** without regional entanglement.
4. The partnership strengthens India's presence in the Gulf while maintaining neutrality in regional rivalries.

Q2. What are the key outcomes of UAE President Sheikh Mohamed bin Zayed Al Nahyan's visit to India?

1. **Strategic Defence Partnership:** LoI signed to develop a formal framework agreement.
2. **Trade and economy:**
 - a. Target to double bilateral trade to **\$200 billion by 2032**
 - b. CEPA (2022) continues to drive non-oil trade growth
3. **Energy:**

- a. 10-year LNG supply agreement between **Hindustan Petroleum Company Ltd** and **Abu Dhabi National Oil Company**
- b. UAE becomes India's **second-largest LNG supplier**

4. **Space, nuclear, digital, and financial cooperation** further broadened.

Q3. How does the India–UAE Strategic Defence Partnership differ from a traditional military alliance?

1. India clarified that the partnership is **not directed against any country**.
2. **Key distinctions:**
 - a. No mutual defence obligation
 - b. No permanent troop deployment
 - c. Focus on capacity-building and defence industry cooperation
3. Cooperation builds on joint exercises like **Desert Eagle** and **Gulf Star-1**.
4. It aligns with India's doctrine of **non-entanglement and strategic autonomy**.

Q4. What is the significance of India–UAE economic and trade cooperation under CEPA?

1. UAE is India's **3rd largest trading partner** and **2nd largest export destination**.
2. **CEPA outcomes:**
 - a. Trade reached ~\$100 billion (FY 2024–25)
 - b. Target of \$200 billion by 2032
3. UAE investment supports:
 - a. Infrastructure
 - b. Energy transition
 - c. AI, fintech, and logistics
4. Initiatives like **Bharat Mart**, **Virtual Trade Corridor**, and **Bharat–Africa Setu** deepen geo-economic integration.

Q5. How does energy cooperation with the UAE strengthen India's long-term energy security?

1. UAE is a **reliable and diversified energy supplier** for India.
2. LNG agreement ensures:
 - a. Stable long-term supply
 - b. Reduced spot market volatility
 - c. Support for India's gas-based transition
3. UAE also hosts **India's strategic crude oil reserves**.
4. Energy cooperation cushions India from **West**

Asia supply disruptions.**Q6. Why is civil nuclear and space cooperation emerging as a new pillar in India–UAE relations?**

- Both countries are expanding cooperation in **advanced technologies**.
- Civil nuclear cooperation:**
 - Large reactors and SMRs
 - Nuclear safety and operations
 - Enabled by India's **SHANTI Act**
- Space cooperation:**
 - LoI between **IN-SPACe** and **UAE Space Agency**
 - Joint missions, start-ups, and commercial space services
- These sectors create **high-skill employment and strategic depth**.

Q7. How does the partnership reflect India's strategic autonomy and multi-alignment approach in West Asia?

- India engages simultaneously with **UAE, Saudi Arabia, Iran, Israel, and the US**.
- The visit reinforces **issue-based partnerships**, not bloc politics.
- India welcomed humanitarian aspects of US peace initiatives but ruled out military participation in non-UN forces.
- This reflects **balanced diplomacy amid competing Gulf rivalries**.

Q8. What challenges does India face in deepening defence cooperation in a volatile Gulf region?

- Perception risks:** Avoiding alignment with one regional camp.
- Operational challenges:**
 - Ensuring cooperation does not imply intervention
 - Preventing spillover from regional conflicts
- Maritime security risks** in the Gulf and Red Sea.
- India must institutionalise cooperation while preserving **policy flexibility**.

Q9. What is the way forward for India–UAE relations in an increasingly unstable regional and global order?

- Deepen geo-economic engagement** through CE-PA-linked manufacturing and logistics.
- Institutionalise defence cooperation** without operational entanglement.

- Leverage UAE capital** for Make in India and Atmanirbhar Bharat.
- Coordinate with Global South partners to uphold **stability and de-escalation** in West Asia.

Conclusion

The India–UAE Strategic Defence Partnership marks a decisive evolution from transactional ties to a **multi-dimensional strategic relationship**. Amid deepening instability in West Asia, India has strengthened cooperation with the UAE while reaffirming its commitment to peace, restraint, and strategic autonomy. The outcomes highlight India's emergence as a **non-aligned yet influential stakeholder** in the Gulf—an approach vital for protecting its energy security, diaspora interests, and long-term geopolitical relevance in a rapidly shifting regional order.

4. India-China Border Issue**Background of the India-China Border**

- The **India-China border** problem goes back to the **colonial period** and **different views** after independence.
- In **1913-14**, the **Simla Conference** was held between **British India, Tibet and China** and **McMahon Line** was drawn to mark the boundary in the **eastern region**, which is **today's Arunachal Pradesh**.
- Tibet**, at that time, exercised **administrative authority** and was **competent to enter treaties** and the **Chinese government** also recognized these rights.
- However, when the **final agreement** was presented, **China refused to sign**.
- Its **objections** were about **Tibet's status** and the **division between Inner and Outer Tibet**, **not about the India-Tibet boundary** marked by the **McMahon Line**.
- China only established **control over Tibet in the 1950s**, which shows that when the **McMahon Line was negotiated**, **none** of the parties (India, China and Tibet) had **raised objections** to the boundary.

Q1. Why does China not accept the McMahon Line today?

- After independence, the situation changed.
- After China's control over Tibet (1950s), it began **rejecting the McMahon Line**, arguing that Tibet was **never independent** and therefore had **no right to sign treaties** with British India.
- China also started calling **Arunachal Pradesh "Zangnan" or South Tibet**, linking it to its **sovereignty claims**.
- By keeping the boundary unsettled, China uses this ambiguity as a **pressure point** against India.

Q2. How did the concept of Line of Actual Control (LAC) emerged?

1. Although the **McMahon Line** defined the boundary in the east, the overall **India-China boundary** was **never fully settled**.
2. China, in the 1950s, started to **expand its claim lines** and in this context the **idea of the Line of Actual Control (LAC)** emerged.
3. The idea of the **Line of Actual Control (LAC)** was first mentioned by Chinese Premier Zhou Enlai in 1959, in a letter to PM Jawaharlal Nehru.
4. He described it as the **line up to which each side exercised actual control and proposed mutual withdrawals** (20 km from McMahon line in the East and from the line up to which each side exercised actual control in the West).
5. India **rejected this idea initially** because accepting the LAC would have meant accepting Chinese control over areas that India claimed as its own, especially **Aksai Chin**.
6. However, after the **1962 India-China war**, no final boundary settlement was reached. China withdrew from the **Eastern Sector**, but retained control in the **Western Sector**.
7. As a result, the LAC came into existence as a **de facto (ground-reality) line**.

Q3. How did India and China manage the LAC afterwards?

1. After the **1962 war**, the LAC existed as a **ground reality** but was **never formally agreed upon**.
2. For decades, both sides had **different perceptions** of where the LAC lay, which often led to **patrol clashes and tensions**.
3. Border tensions increased after Chinese actions at **Wangdung (1986-87)**.
4. **Rajiv Gandhi's visit to China (1988)** stabilised the ties but also highlighted the need for **border management mechanisms**.
5. India pragmatically accepted the concept of the LAC in the **Border Peace and Tranquillity Agreement (BPTA), 1993**, signed during **P.V. Narasimha Rao's** visit to China.
6. The agreement mandated respect for the LAC **pending final boundary settlement**.
7. It was followed by the **1996 Agreement on Military Confidence-Building Measures (CBMs)** which added **operational restraints and communication mechanisms**.
8. **Article 10 of the 1996 agreement** called for **exchange of maps** to develop a common understanding of the LAC.
9. By **2002**, maps for the **Middle Sector** were ex-

changed. But, China refused to exchange maps for the **Western Sector**, claiming India had exaggerated its claims.

10. The clarification process **collapsed by 2004**, leaving the LAC ambiguous.

Q4. How has India responded to China's claims on Arunachal Pradesh?

1. India controls Arunachal Pradesh up to the **watershed boundary**, with **only three small pockets** under Chinese "**adverse possession**" (**Namka Chu, Sumdorong Chu, and Longju**).
2. Initially, China hinted at compromise. **Zhou Enlai in 1960** and **Deng Xiaoping in 1979-80** offered "**package proposals**": concessions in the East for concessions in the West.
3. But by 1985, China reversed its stance, **demanding major concessions** in the Eastern Sector, especially around **Tawang**. India rejected this shift.
4. In the **2005 Agreement on Political Parameters**, India ensured **protection for settled populations in border areas**, safeguarding Tawang.
5. China reluctantly accepted, but soon revived its narrative of "**Zangnan**" (**South Tibet**).
6. Today, China **reiterates its claims more aggressively, renaming places, raising sovereignty rhetoric, and harassing Indian nationals**, while India continues to firmly **reject these moves and reinforce deterrence**.

Q5. Why has China become more assertive along the LAC in recent years?

1. Over the past decade, **China** has become **more aggressive** through "**grey zone operations**" - small, incremental moves to change the situation on the ground without triggering outright war.
2. In **Eastern Ladakh, disengagement** after the **2020 Galwan clash** remains **incomplete**, with restrictions on Indian patrols and grazing.
3. In the **Eastern Sector**, China now **blurs the line between LAC management and sovereignty claims**, making the dispute sharper.
4. President **Xi Jinping** has emphasised that China will not cede "**even an inch**" of territory.
5. China believes **time favours it** and prefers sustained pressure over early settlement.

Implications

1. Persistent border tension **undermines trust and stability** in India-China relations.
2. **Ambiguity increases the risk of miscalculation and escalation**.
3. China's claims on Arunachal Pradesh challenge India's **territorial integrity**.

4. The LAC issue has become central to India's **security and deterrence strategy**.

Challenges and Way Forward

| Challenges | Way Forward |
|---|---|
| Ambiguity of the LAC due to lack of a mutually agreed and demarcated boundary | Resume the clarification and confirmation of the LAC through exchange of maps sector-wise, as envisaged in past agreements |
| Grey zone operations by China | Strengthen border surveillance, infrastructure, and rapid response mechanisms to prevent unilateral changes on the ground |
| Breakdown of confidence- building measures (CBMs) after 2020 | Restore and update CBMs , including disengagement protocols, buffer zone management, and communication channels |
| Restrictions on Indian patrolling and grazing in Eastern Ladakh | Ensure restoration of status quo ante , with equal access for Indian patrols and traditional grazing rights |
| China blurring LAC management with sovereignty claims | Firmly separate border management from sovereignty negotiations through diplomatic and military engagement |
| Rising claims on Arunachal Pradesh through rhetoric and administrative actions | Respond with strong diplomatic signalling , domestic integration, and international awareness of India's legal position |
| Risk of incremental territorial loss over time | Enhance credible deterrence through forward deployment, logistics, and jointness among armed forces |
| China's preference for delaying final settlement | Maintain long-term strategic patience while strengthening India's economic, military, and diplomatic leverage |

Conclusion

China's deliberate use of ambiguity along the LAC has turned unresolved borders into a strategic pressure tool. India must combine firm diplomacy, credible deterrence, and sustained engagement to prevent unilateral changes and protect its territorial integrity.

5. India, FTAs and Trade Deficits

Context

Recent analysis highlights that **India's trade deficit with several FTA partner countries is widening**, even as overall trade volumes increase. At the same time, **electronics exports have emerged as a strong performer**, indicating a sector-specific success within India's trade and industrial ecosystem. This mixed outcome raises important questions about the design of FTAs and India's export competitiveness.

Q1. What is a trade deficit and what does the recent data indicate for India?

1. A **trade deficit** occurs when a country's **imports exceed its exports**.
2. **Key Observation:**
 - a. India imports more goods from many FTA partners than it exports to them
 - b. This has led to a **persistent and widening trade deficit** with certain FTA countries
3. **Why this matters:**
 - a. A rising trade deficit can pressure do-

mestic industries

- b. It raises concerns about long-term trade sustainability

Q2. What are Free Trade Agreements (FTAs) and why does India enter into them?

1. A **Free Trade Agreement (FTA)** is an agreement between two or more countries to **reduce or eliminate import duties** on goods traded between them.
2. **Objectives of FTAs:**
 - a. Increase exports
 - b. Integrate into global value chains
 - c. Attract foreign investment
 - d. Provide cheaper inputs to domestic industries
3. India has FTAs with **ASEAN, Japan, South Korea, UAE, and Australia**, among others.

Q3. Why is India's trade deficit widening with several FTA partner countries?

1. **Surge in Imports**
 - a. Lower tariffs make imports cheaper

- b. Indian industries depend on imported components and machinery
- c. Partner countries have stronger manufacturing competitiveness

2. Limited Export Diversification

- a. India's exports remain concentrated in:
 - i. Petroleum products
 - ii. Textiles
 - iii. Gems and jewellery
- b. High-technology exports remain limited in many FTA markets

3. Weak Enforcement of Rules of Origin

- a. **Rules of Origin** decide where a product is actually manufactured
- b. Weak enforcement allows third-country goods to enter India through FTA routes

Q4. How can India's FTA-related trade deficit be explained using economic theory?

1. Using **comparative advantage theory**, countries specialise in goods they can produce efficiently.
2. **India's Situation:**
 - a. FTA partners specialise in:
 - i. Electronics
 - ii. Machinery
 - iii. Chemicals
 - b. India imports these goods due to cost and quality advantages
3. However, due to incomplete domestic manufacturing capability and limited value addition, India's imports rise faster than exports, leading to a **structural trade deficit**.
4. Thus, the deficit reflects **asymmetric competitiveness**, not merely policy failure.

Q5. Why have electronics exports emerged as a standout performer?

1. Despite overall trade deficits, **electronics exports have grown rapidly**.
2. **Key Drivers:**
 - a. Global supply chain diversification away from China
 - b. Large domestic market enabling scale
 - c. Improved logistics and infrastructure
 - d. Government incentives for domestic manufacturing
3. Major export items include:
 - a. Mobile phones
 - b. Electronic components

4. This indicates a **structural shift in India's export profile**.

Q6. What role has industrial policy played in boosting electronics exports?

1. India's electronics success highlights the importance of **targeted industrial policy**.
2. **Role of PLI Schemes:**
 - a. Incentivise higher production
 - b. Encourage global firms to manufacture in India
 - c. Promote technology transfer and skill development
3. According to **infant industry theory**, temporary state support helps new industries become globally competitive.
4. Electronics exports validate this approach when policy, scale, and global opportunity align.

Q7. Does a widening trade deficit with FTA partners necessarily harm the Indian economy?

1. A trade deficit is **not always harmful**.
2. **When it can be acceptable:**
 - a. Imports include capital goods that improve productivity
 - b. Deficit is financed sustainably
 - c. Exports grow in high-value sectors over time
3. **When it becomes problematic:**
 - a. Persistent consumer goods imports
 - b. Weak domestic manufacturing
 - c. Job losses in import-competing sectors
4. Thus, the **quality of imports matters more than the size of the deficit**.

Q8. What policy lessons and corrective measures emerge for India's future trade strategy?

1. **Key Lessons**
 - a. FTAs must align with domestic manufacturing capacity
 - b. Export competitiveness is as important as market access
2. **Corrective Measures**
 - a. Strengthen domestic manufacturing ecosystems
 - b. Enforce Rules of Origin strictly
 - c. Promote export diversification into electronics, green tech, and defence
 - d. Design future FTAs with stronger safeguard clauses

- India's trade strategy must balance **openness with self-reliance**.

Conclusion

India's widening trade deficit with FTA partners highlights **structural weaknesses in manufacturing competitiveness**, not a failure of trade integration itself. At the same time, the success of electronics exports demonstrates that **when industrial policy, global opportunity, and domestic capability align**, India can achieve export-led growth. The challenge ahead lies in replicating this success across other sectors while redesigning FTAs to support long-term economic resilience.

6. Quad's Strategic Interregnum in 2025

Context

- The year gone by (**2025**) has often been described as a "**year of interregnum**" (period of temporary absence) for the Quad.
- There were **fewer summits, limited public announcements, and no major new initiatives**.
- This created a perception that the **Quad was slowing down or losing momentum**.
- However, this phase was **shaped by domestic political priorities** of member countries and multiple global crises.
- Rather than decline, the period reflected a **strategic pause**, where the Quad focused on **maintaining unity, avoiding escalation, and consolidating existing cooperation**.
- Understanding this phase is important to judge the Quad's evolving role in the Indo-Pacific.

Q1. What is the Quad and why is it important in the Indo-Pacific?

- The **Quadrilateral Security Dialogue (Quad)** is a **strategic partnership** among **India, the United States, Japan, and Australia**.
- Its **main objective** is to support a free, open, inclusive, and rules-based Indo-Pacific region.
- Why is the Quad important?**
 - It brings together major democracies with shared interests
 - It supports freedom of navigation and respect for international law
 - It addresses **security, economic, technological, and humanitarian issues**
- The Quad is **not a military alliance**. Its flexibility allows cooperation without forcing countries into rigid blocs, making it acceptable to many Indo-Pacific nations.

Q2. What does the term "year of interregnum" mean in the Quad context?

- An **interregnum** means a **period between two active phases**.
- In the Quad's case, it refers to a year when activities slowed but did not stop.
- What this **phase involved**
 - Fewer leader-level meetings
 - Limited public messaging
 - No major new initiatives announced
- However, this did **not mean disengagement**.
- The Quad chose **caution and consolidation**, showing that it values **long-term stability** over short-term visibility.

Q3. Why did the Quad receive less attention in 2025?

- The Quad received less attention mainly because **global focus shifted** elsewhere.
- Key reasons**
 - Major international crises dominated headlines
 - Domestic political agendas took priority
 - Diplomatic energy was spread thin
- At the same time, the Quad avoided aggressive signalling to **prevent regional anxiety**.
- While media attention declined, **coordination at official and working levels** continued quietly.

Q4. What global and regional factors contributed to the Quad's slower pace?

- Several global and regional developments influenced the Quad's restrained approach.
- Global factors**
 - Conflicts in Europe and West Asia
 - Economic slowdown and inflation
 - Increased pressure on diplomatic and military resources
- Regional factors**
 - Sensitivity of Indo-Pacific geopolitics
 - Desire to reassure ASEAN countries
 - Risk of escalation if messaging became too sharp
- These factors pushed the Quad towards a **low-profile but steady approach**, focusing on **balance** rather than confrontation.

Q5. How did domestic political priorities of Quad countries affect its momentum?

- Domestic politics strongly shaped Quad engage-

ment during the year.

2. Domestic constraints:

- a. Elections and leadership changes
 - b. Focus on economic recovery and social issues
 - c. Political caution in foreign policy decisions
3. Governments **avoided major foreign initiatives** that could create domestic debate.
 4. As a result, Quad **diplomacy became quieter**, but not inactive.
 5. This shows how **internal politics** directly **influence foreign policy behaviour**.

Q6. Did the Quad lose strategic relevance during this period?

1. The Quad did **not lose strategic relevance**.
2. Why **relevance was maintained**
 - a. **Shared strategic understanding** remained intact
 - b. **Institutional mechanisms** continued to function
 - c. **Cooperation** shifted from visible summits to steady coordination
3. Relevance is not measured only by announcements.
4. By **preserving trust and unity**, the Quad ensured it remained a viable and credible grouping during a sensitive phase.

Q7. How did the Quad manage the China factor during the interregnum?

1. China remained an important but unstated consideration in Quad thinking.
2. **Quad's approach**
 - a. Avoided directly naming China
 - b. Focused on rules, norms, and international law
 - c. Strengthened resilience through cooperation
3. This approach **helped address concerns** without provoking confrontation.
4. It **balanced deterrence with reassurance**, especially for smaller regional countries.

Q8. What role did India play in sustaining the Quad during this phase?

1. India acted as a **balancing and stabilising force** within the Quad.
2. **India's role**
 - a. Emphasised **inclusiveness and develop-**

ment

- b. Resisted turning the Quad into a military alliance
 - c. Highlighted **cooperation in technology, climate, and Global South issues**
3. India's approach helped maintain the **Quad's flexibility and regional acceptability**, while **preserving strategic coordination**.

Q9. How did the Quad continue cooperation beyond security issues?

1. Despite fewer summits, Quad cooperation continued in practical areas.
2. **Key areas**
 - a. Supply chain resilience
 - b. Critical and emerging technologies
 - c. Climate action and disaster relief
 - d. Health security and infrastructure
3. This showed that the Quad is also a **provider of regional public goods**, not just a security grouping.

Q10. What does this interregnum indicate about the Quad's future direction?

1. The interregnum suggests that the Quad is becoming **more mature and sustainable**.
2. What it indicates
 - a. Preference for substance over symbolism
 - b. Issue-based, flexible cooperation
 - c. Readiness to scale up when conditions allow
3. The Quad is **evolving from a reactive platform** into a **steady long-term partnership**.

Conclusion

The year 2025 was not a decline for the Quad but a **strategic pause**. Reduced visibility masked **steady coordination, internal consolidation, and growing maturity**. The interregnum highlights the Quad's ability to **balance domestic pressures, regional sensitivities, and long-term strategic goals**, making it a more **resilient and credible** force in the Indo-Pacific.

7. Israel's Recognition of Somaliland

Context

In December 2025, **Israel** formally recognised **Somaliland** as an independent sovereign state. This decision has altered regional geopolitics and pushed Somaliland into the centre of great-power competition in the Horn of Africa.

Q1. Why is Israel's recognition of Somaliland geopolitically significant?

1. Diplomatic Rupture

- a. Israel's move breaks with the long-standing international position that treats Somaliland as part of **Somalia**.
- b. It risks encouraging other states to reconsider Somaliland's status.

2. Regional Security Risks

- a. The decision may intensify proxy rivalries in the Horn of Africa.
- b. It could further militarise the Red Sea-Gulf of Aden maritime corridor.

3. Great-Power Implications

- a. The recognition has direct consequences for China, the United States, and Middle Eastern powers with strategic interests in the region.

Q2. Why does Israel's move pose a major dilemma for China?

For **China**, Somaliland lies at the intersection of three core strategic interests:

1. Protection of the "One China" Principle

- a. China strongly opposes any form of separatism due to its position on **Taiwan**.

2. Security of the Red Sea Trade Route

- a. The Red Sea is vital for Chinese energy imports and global trade.

3. Managing Great-Power Competition in Africa

- a. China seeks to prevent rivals from gaining strategic footholds near its overseas assets.

Q3. How has China officially responded to Israel's recognition?

1. China condemned Israel's decision as legitimising separatism.
2. Beijing reiterated that Somaliland is an inseparable part of **Somalia**.
3. This stance is consistent with China's rigid sovereignty doctrine and domestic concerns regarding **Taiwan**.

Q4. Why does Somaliland challenge China's sovereignty doctrine?

1. De Facto Statehood

- a. Somaliland has maintained internal peace, built institutions, and held elections for over 30 years.
- b. This contrasts sharply with **Somalia's** prolonged instability.

2. Limits of Rigid Sovereignty

- a. China does not accept internal legitima-

cy as a basis for statehood.

- b. However, Somaliland's sustained governance exposes the practical limits of this approach.

Q5. How does the Taiwan factor deepen China's discomfort?

1. In 2020, Somaliland established official ties with **Taiwan**.
2. **Taiwan** opened a representative office in Hargeisa and expanded cooperation.
3. Apart from **Eswatini**, Somaliland is the only African entity openly aligned with **Taipei**.
4. This directly challenges China's diplomatic red lines.

Q6. Why is the Bab el-Mandeb region strategically crucial for China?

1. The **Bab el-Mandeb Strait** connects the Red Sea with the Gulf of Aden.
2. It is a critical maritime chokepoint under China's Maritime Silk Road.
3. China established its first overseas military base in **Djibouti** in 2017 to secure this route.
4. Any rival security presence near this corridor threatens China's leverage.

Q7. How could Israel's move alter regional power dynamics?

1. International legitimacy for Somaliland could transform it into:
 - a. A logistics hub
 - b. A security and intelligence node
2. Possible backing from **Israel**, the **UAE**, and the **United States** would weaken China's strategic dominance near **Djibouti**.
3. China risks losing its monopoly influence in the western Indian Ocean region.

Q8. What strategic options are available to China?

1. Diplomatic Blocking

- a. Use its position at the UN Security Council to prevent wider recognition.

2. Hybrid Measures

- a. Economic pressure
- b. Political lobbying
- c. Information campaigns through Chinese media networks such as **StarTimes**

3. Strategic Restraint

- a. Excessive coercion may push Somaliland closer to **Taiwan** and Western pow-

ers.

- b. Heavy-handed actions could damage China's non-interference image.

Q9. How do wider geopolitical developments complicate China's position?

1. Middle East Politics

- a. China's pro-Palestinian stance strengthens its criticism of Israel.
- b. However, it risks entangling Beijing in West Asian political rivalries.

2. Growing Support for Somaliland

- a. Ethiopia's 2024 MoU offering port access in exchange for recognition
- b. Rising interest in the U.S. Congress
- c. Tacit support from the UAE

3. Each new endorsement raises the cost for China of maintaining diplomatic isolation.

Conclusion

Israel's recognition has transformed Somaliland from a marginal entity into a focal point of great-power rivalry. For China, the challenge is to balance sovereignty principles with strategic pragmatism in a region vital to global trade and security.

8. Gaza Peace Board

Context

The United States, under President **Donald Trump**, has invited India to join the proposed **Board of Peace for Gaza**, a new governance and conflict-management mechanism intended to oversee Gaza's post-war transition after prolonged conflict and humanitarian devastation.

The proposal is part of Trump's **20-point Comprehensive Peace Plan**, which has received endorsement through **United Nations Security Council Resolution 2803**, authorising a transitional framework until 2027. However, the initiative has sparked a wider debate on the **future of global governance**, the authority of the UNSC, and the rise of **power-driven arrangements outside the UN system**.

Q1. Why has the United States proposed a "Board of Peace" for Gaza, and what strategic objectives does it seek to achieve in the post-war regional order?

1. The proposal aims to manage the **governance vacuum** in Gaza following the destruction of administrative institutions.
2. **Strategic objectives include:**
 - a. Preventing Hamas from returning to power

- b. Avoiding full Israeli re-occupation
- c. Internationalising reconstruction costs
- d. Retaining decisive U.S. strategic oversight

3. The Board allows the U.S. to shape the **political end-state** of Gaza rather than limiting its role to ceasefire mediation.
4. It reflects Washington's view that traditional multilateral mechanisms are **slow, divided, and ineffective** in high-intensity conflicts.

Q2. What is the structure, mandate, and governance model of the proposed Board of Peace for Gaza?

1. The Board is designed to function as both an **international organisation** and a **transitional governing authority**.
2. **Mandate includes:**
 - a. Supervising Gaza's transitional administration
 - b. Coordinating reconstruction and investment
 - c. Restoring civil institutions
 - d. Ensuring accountability during the transition
3. Membership is **invitation-only**, not based on universal representation.
4. Final authority rests with the **U.S. President**, making it a highly centralised governance model unlike UN trusteeships.

Q3. How does the Board of Peace reflect a shift away from UN-centric multilateralism toward U.S.-led ad hoc governance mechanisms?

1. The initiative represents a shift toward **selective multilateralism**, led by a dominant power.
2. **Key features of this shift:**
 - a. Bypassing UNSC consensus-based decision-making
 - b. Concentration of authority in an executive council
 - c. Reduced role for universal institutions
3. It aligns with Trump's long-standing scepticism toward multilateral bodies such as WHO and UNESCO.
4. The approach reflects a belief that **speed and control** matter more than broad legitimacy.

Q4. Why has the exclusion of Palestinians from the top decision-making tier raised concerns of legitimacy and sustainability?

1. Palestinians are absent from the **Founding Executive Council**, which controls strategy and funding.
2. **Concerns include:**
 - a. Lack of local ownership
 - b. Perception of imposed governance
 - c. Weak public trust in institutions
3. Political theory suggests that **peace without representation** risks instability.
4. The Palestinian-led NCAG occupies the lowest tier, raising doubts about its real authority.

Q5. What is India's position on the Board of Peace, and how does it align with India's long-standing West Asia policy principles?

1. India has received the invitation but **has not formally accepted** it.
2. **India's stated principles:**
 - a. Consistent support for a **Two-State Solution**
 - b. Emphasis on humanitarian assistance
 - c. Respect for UN-mandated peacekeeping
3. India welcomed the first phase of Trump's plan, especially hostage release and aid delivery.
4. India has **ruled out troop participation**, as the ISF is not a UN mission.

Q6. Why has Israel objected to certain members of the Board of Peace despite the initiative being U.S.-led?

1. Israel has objected particularly to the inclusion of **Turkey and Qatar**.
2. **Israeli concerns include:**
 - a. Turkey's perceived proximity to the Muslim Brotherhood
 - b. Qatar's previous engagement with Hamas
 - c. Fear of dilution of Israeli security priorities
3. These objections reveal **internal fractures** even among close allies.
4. They underline competing visions for Gaza's post-war future.

Q7. What are the implications of the proposed International Stabilisation Force (ISF) for Gaza's sovereignty and security architecture?

1. The ISF is mandated to ensure **permanent disarmament**.
2. **Implications include:**

- a. Long-term external military presence
 - b. Reduced local security autonomy
 - c. Risk of resistance due to legitimacy deficit
3. Historical experience shows externally imposed security structures face sustainability challenges.
 4. India's refusal reflects its commitment to **UN peacekeeping norms**.

Q8. What risks does the Board of Peace pose to the existing UN-led international order and collective security framework?

1. It risks **eroding the centrality of the UN**.
2. **Systemic risks include:**
 - a. Weakening collective security norms
 - b. Normalising power-driven governance
 - c. Marginalising Global South voices
3. Success of such models could divert legitimacy and resources away from the UN.
4. It may undermine long-standing calls for **UNSC reform**.

Q9. What strategic options does India have in responding to the invitation without compromising its commitment to multilateralism?

1. **Calibrated engagement:** Participate diplomatically without endorsing UN bypass.
2. **Defend multilateralism:** Emphasise UN-authorized mechanisms.
3. **Strategic autonomy:** Balance U.S. ties with principled positions.
4. **Push UN reform:** Use the crisis to highlight reform urgency, not replacement.

Conclusion

The invitation to India to join the **Board of Peace for Gaza** places New Delhi at a critical crossroads. While the initiative promises decisiveness, it also challenges the **UN-led multilateral order** that India has long defended. India's response will test its ability to balance **principle with pragmatism**, ensuring that flexibility in diplomacy does not undermine legitimacy in global governance. In a rapidly changing world order, India's choices today will shape its credibility as a defender of inclusive, rules-based international cooperation.

9. Global Risks Outlook 2026

Context

The **Global Risks Perception Survey (GRPS) 2026**, released by the **World Economic Forum**, presents a sobering assessment of the global outlook. Uncertainty has

emerged as the defining theme, with **50% of respondents expecting a turbulent or stormy world over the next two years, rising to 57% over the next decade.** The report highlights the retreat of multilateralism, intensifying geoeconomic confrontation, rising economic fragility, unchecked technological risks, deepening social polarization, and a worrying deprioritization of environmental risks in the short term. Together, these trends signal a transition toward a **contested, multipolar, and competitive global order.**

Q1. Why does the Global Risks Outlook 2026 identify uncertainty as the defining feature of the global system, and how does this reflect deeper structural changes in global governance and cooperation?

1. Uncertainty dominates the global outlook because **multiple risk systems are interacting simultaneously**, rather than operating in isolation.
2. **Structural reasons for uncertainty**
 - a. Weakening global institutions
 - b. Breakdown of trust between states
 - c. Faster transmission of shocks across borders
 - d. Technology accelerating both opportunities and threats
3. From a systems perspective, the world is facing **polycrisis**—a situation where economic, geopolitical, technological, social, and environmental risks reinforce one another.
4. This makes outcomes unpredictable and governance responses more difficult.

Q2. What explains the growing pessimism in both the short-term (2026–28) and long-term (to 2036) global outlook, despite slight improvement in long-term perceptions compared to last year?

1. The sharp rise in pessimism over the next two years reflects **immediate geopolitical and economic stress**, while the long-term outlook shows slight improvement due to expectations of eventual adjustment.
2. **Short-term drivers**
 - a. Active conflicts and risk of spillovers
 - b. Trade restrictions and sanctions
 - c. Fragile supply chains
3. **Long-term nuance**
 - a. Hope in technological adaptation
 - b. Potential rebuilding of cooperation
4. However, the persistence of high pessimism shows that **structural problems remain unresolved**, merely postponed.

Q3. What is meant by “geoeconomic confrontation,” and why has it emerged as the most significant global risk in the near term?

1. **Geoeconomic confrontation** refers to the strategic use of economic tools by states to achieve geopolitical objectives.
2. **Tools of geoeconomic confrontation**
 - a. Trade tariffs and export controls
 - b. Sanctions and investment restrictions
 - c. Subsidies and state aid
 - d. Currency and financial measures
3. **Why it tops the risk list**
 - a. Directly disrupts global trade and supply chains
 - b. Undermines multilateral trade rules
 - c. Increases risk of military conflict
4. Recent examples include **U.S. tariff actions and China’s restrictions on critical mineral exports**, signalling economic weaponization.

Q4. How does the retreat of multilateralism contribute to rising geopolitical and economic instability across regions?

1. Multilateral institutions provide **predictability, rules, and conflict resolution mechanisms.**
2. **Effects of multilateral retreat**
 - a. Erosion of trust and transparency
 - b. Rise of unilateral and protectionist actions
 - c. Fragmentation of global norms
3. Without cooperative frameworks, states increasingly pursue **zero-sum strategies**, increasing systemic fragility and the likelihood of conflict.

Q5. Why are economic risks such as downturns, inflation, and asset bubbles intensifying simultaneously in the current global environment?

1. Economic risks are interconnected rather than isolated.
2. **Key drivers**
 - a. High global debt levels
 - b. Tight monetary conditions
 - c. Asset price inflation
 - d. Trade disruptions due to geoeconomics
3. From an economic theory perspective, these conditions resemble a **late-stage global cycle**, where shocks can trigger cascading failures across markets and societies.

Q6. How do technological risks—particularly cyber insecurity, misinformation, and adverse outcomes of AI—amplify existing geopolitical and societal vulnerabilities?

1. Technology is a **risk multiplier**.
2. **Major technological risks**
 - a. Cyber insecurity (#6 short-term risk)
 - b. Misinformation and disinformation (#2 short-term risk)
 - c. Adverse outcomes of AI (#5 long-term risk)
3. **Amplification effects**
 - a. Cyber attacks disrupt critical infrastructure
 - b. Disinformation erodes democratic trust
 - c. AI reshapes labour markets and warfare
4. Unregulated technological diffusion increases instability across political, economic, and security domains.

Q7. Why are societies increasingly described as being “on the edge,” and how do inequality and polarization interact to weaken democratic governance?

1. Societies face growing pressure from **inequality, polarization, and institutional mistrust**.
2. **Key drivers**
 - a. Rising wealth concentration
 - b. Cost-of-living pressures
 - c. Weak social protection systems
3. The emergence of “streets versus elites” narratives reflects a **crisis of legitimacy**, where citizens doubt the ability of governments to deliver equitable outcomes.

Q8. Why are environmental risks being deprioritized in the short term despite remaining the most severe long-term global threats?

1. Short-term crises divert attention from long-term threats.
2. **Reasons for deprioritization**
 - a. Immediate geopolitical conflicts
 - b. Economic stress and inflation
 - c. Political focus on growth and security
3. Yet, over the 10-year horizon, environmental risks dominate, with **extreme weather events ranked as the most severe global risk**. This mismatch reflects a **temporal governance failure**—short-termism overriding long-term survival.

Q9. What are the major risks faced by India in this global risk landscape, and how should India respond strategically?

1. **Key risks for India**
 - a. Cyber insecurity
 - b. Inequality (income and wealth)
 - c. Insufficient public services and social protection
 - d. Exposure to geoeconomic fragmentation
2. **Strategic responses**
 - a. Strengthen digital and cyber resilience
 - b. Invest in inclusive growth and social safety nets
 - c. Diversify trade and supply chains
 - d. Reinforce multilateral engagement
3. India must balance **strategic autonomy with strategic cooperation** to navigate this volatile environment.

Conclusion

The Global Risks Outlook 2026 presents a world defined not by a single dominant threat, but by **persistent uncertainty arising from intersecting risks**. Geoeconomic confrontation, technological disruption, social polarization, and environmental stress together challenge the foundations of global stability. For India and the world, the path forward lies not in isolation, but in **strategic collaboration, resilient institutions, and long-term thinking**. History shows that order can be rebuilt, but only if nations choose cooperation even amid competition.

10. India-Germany Strategic Partnership

Context

In January, Prime Minister **Narendra Modi** and German Chancellor **Friedrich Merz** held bilateral talks in Gandhinagar. The visit came ahead of the India–EU Summit and reaffirmed India–Germany ties at a time of global geopolitical shifts, with both leaders backing early conclusion of the India–EU Free Trade Agreement (FTA).

Q1. Why was the Modi–Merz meeting significant?

1. The visit coincided with:
 - a. 25 years of the India–Germany Strategic Partnership.
 - b. 75 years of diplomatic relations between the two countries.
2. It was Chancellor Merz’s first visit to India and Asia after assuming office.
3. The meeting took place ahead of the India–EU

Leaders' Summit on January 27, giving it broader regional and economic significance.

Q2. What were the key agreements and outcomes of the visit?

1. India and Germany signed **19 agreements and joint declarations**, covering multiple sectors.
2. Key outcomes included:
 - a. Roadmap for defence industrial cooperation.
 - b. Roadmap for cooperation in higher education.
 - c. Joint declaration on critical minerals and semiconductor ecosystems.
 - d. Establishment of an Indo-Pacific bilateral dialogue mechanism.
3. A **visa-free transit regime** was announced for Indian passport holders transiting through German airports for onward travel.

Q3. How does defence cooperation feature in India–Germany relations?

1. Defence and security cooperation was highlighted as a symbol of mutual trust.
2. Both sides agreed to develop a roadmap for:
 - a. Co-development and co-production in defence.
 - b. Stronger defence industry collaboration.
3. Ongoing cooperation areas include:
 - a. Submarines.
 - b. Obstacle avoidance systems for helicopters.
 - c. Counter-unmanned aerial systems.
4. Joint military exercises, port visits, and consultations were reaffirmed to support security in the Indo-Pacific.
5. Germany emphasised that deeper defence cooperation would help India reduce dependence on legacy suppliers, including Russia.

Q4. What were the outcomes in education and skill development?

1. A roadmap on higher education cooperation was announced.
2. India invited German universities to establish campuses in India.
3. Both sides agreed to set up an **Indo-German Centre of Excellence for Skilling in Renewable Energy**.
4. Germany committed to expanding the teaching of the German language in:
 - a. Secondary schools.

- b. Universities.
 - c. Vocational education and training centres.
5. These steps aim to strengthen people-to-people ties and skilled workforce mobility.

Q5. Why is the India–EU Free Trade Agreement important in this context?

1. Modi and Merz jointly supported the early conclusion of the **India–EU Free Trade Agreement**.
2. The FTA is expected to:
 - a. Boost trade and investment flows.
 - b. Enhance market access.
 - c. Strengthen supply chain resilience.
3. Germany, as the largest economy in the **European Union**, plays a key role in shaping EU consensus.
4. The FTA is projected as a major outcome of the upcoming India–EU Summit.

Q6. What areas of cooperation were highlighted in emerging technologies?

1. Both leaders welcomed progress in cooperation on:
 - a. Semiconductors.
 - b. Critical minerals.
 - c. Digitalisation and telecommunications.
 - d. Health and bioeconomy.
2. These sectors are central to future economic competitiveness and strategic autonomy.

Q7. How does the Indo-Pacific figure in the partnership?

1. India and Germany reaffirmed commitment to a **free and open Indo-Pacific**.
2. Both sides emphasised:
 - a. Respect for international law, including **United Nations Convention on the Law of the Sea**.
3. A new Indo-Pacific consultation mechanism was announced.
4. India welcomed Germany's growing engagement in the region as part of a broader European strategic outlook.

Conclusion

The Modi–Merz meeting reinforced India–Germany ties across defence, education, technology, and geopolitics. Support for the India–EU FTA and closer Indo-Pacific cooperation signal a deepening strategic partnership aligned with shared democratic values and long-term global interests.

11. Pax Silica: Why Was India Late?

Context

India's delayed entry into US-led initiatives such as **Pax Silica** and the **Minerals Security Partnership (MSP)** has generated concern within policy circles. In both cases, India joined after the initiatives had already taken shape and their core membership was fixed. While India's inclusion reflects improving ties with the United States, the timing sends a more sobering message about the **new rules of global strategic cooperation**. In today's world, influence is no longer derived only from market size or political alignment, but from **control over technology, materials, platforms, and supply-chain chokepoints**. Pax Silica highlights how the global tech order is being reorganised around **capability-based coalitions**, not aspirational partnerships.

Q1. Why does India's delayed entry into Pax Silica and the Minerals Security Partnership matter in the context of the emerging global technology and supply-chain order?

1. Timing in strategic groupings is not symbolic; it determines **who shapes rules and who adapts to them**.
2. **Why late entry matters**
 - a. Founding members define standards, norms, and priorities
 - b. Late entrants accept pre-set frameworks
 - c. Leverage accumulates with agenda-setters
3. In supply-chain coalitions, early members decide **where manufacturing, processing, and investment will concentrate**.
4. India's delayed inclusion suggests that while it is geopolitically important, it is **not yet indispensable** in the technology ecosystem that these initiatives aim to secure.

Q2. What is Pax Silica, and how does it represent a deeper shift in US strategy from globalisation toward selective, security-driven technological coalitions?

1. Pax Silica is a **US-led strategic initiative** designed to counter China's dominance in next-generation technologies by securing the **silicon-AI-critical minerals ecosystem**.
2. **Strategic shift reflected**
 - a. From open global markets → trusted economic blocs
 - b. From efficiency → resilience
 - c. From trade logic → national security logic

3. This reflects a broader move toward **geo-economic statecraft**, where technology supply chains are treated as strategic assets rather than commercial flows.

Q3. What are the key objectives and operational focus areas of Pax Silica across the AI and semiconductor value chain, and why are these areas geopolitically sensitive?

1. Pax Silica aims to secure the **entire AI stack**, recognising that control over any single chokepoint can translate into strategic power.
2. **Key focus areas**
 - a. Critical minerals and magnet supply
 - b. Semiconductor fabrication and equipment
 - c. AI chips, models, and applications
 - d. Data centres, fibre-optic cables, and logistics
 - e. Protection from hostile foreign ownership
3. By linking these layers, Pax Silica seeks to ensure that **technological leadership cannot be disrupted through economic coercion**.

Q4. Why was India initially excluded from Pax Silica despite strong political alignment with the US and shared concerns about China's technological dominance?

1. India's exclusion was driven by **capability gaps, not trust deficits**.
2. **Structural reasons**
 - a. Limited advanced semiconductor fabrication
 - b. Weak presence in mineral processing and refining
 - c. Dependence on imports for high-end chips
 - d. Absence of globally dominant AI platforms
3. In Pax Silica, membership is based on **what a country controls today**, not on future potential.
4. India's strengths lie in software and talent, but **control over hardware and materials remains limited**.

Q5. What specific, non-substitutable strengths do the founding members of Pax Silica bring that explain their early inclusion?

1. Each founding member contributes a **critical node that cannot be easily replaced**.

2. Unique strengths

- a. **Netherlands:** lithography machines essential for advanced chips
- b. **Japan & South Korea:** precision manufacturing and chipmaking
- c. **Australia:** critical mineral reserves
- d. **Israel:** frontier innovation and defence tech
- e. **Singapore:** global logistics and data hub
- f. **UK:** financial, legal, and technology services
- g. **UAE:** rapidly scaling AI infrastructure

3. Together, they form a **closed loop of trusted capability**, something India is still building.

Q6. How does India's experience with the Minerals Security Partnership mirror the Pax Silica episode, and what long-term structural lesson does this pattern reveal?

1. The **Minerals Security Partnership** followed the same pattern of selective inclusion.
2. **MSP parallels**
 - a. Early members had mining or processing dominance
 - b. India joined later despite diplomatic outreach
 - c. Capability preceded membership
3. The repeated pattern sends a consistent message: **strategic intent is necessary, but strategic assets are decisive.**
4. Coalitions form around control, not commitment alone.

Q7. Why is China's dominance in critical minerals and processing central to the logic of Pax Silica and similar US-led initiatives?

1. China dominates **processing and refining**, which is more strategically valuable than mining.
2. **Strategic implications**
 - a. Ability to influence global prices
 - b. Leverage over downstream industries
 - c. Use of export controls as coercive tools
3. This dominance has turned minerals into **geopolitical pressure points**, prompting the US and allies to create counter-networks like Pax Silica.

Q8. What strategic opportunities and risks does deeper participation in Pax Silica-type coalitions pose for India's foreign policy and economic autonomy?

1. Opportunities

- a. Access to capital and advanced technology
- b. Entry into trusted supply chains
- c. Reduced dependence on China

2. Risks

- a. Exposure to Chinese retaliation
- b. Pressure to align with bloc politics
- c. Reduced strategic flexibility
3. India must balance **alignment with autonomy**, ensuring it gains capability without losing policy space.

Q9. What concrete steps must India take to evolve from a late entrant into a "partner of first choice" in future global technology coalitions?

1. India must transition from **potential to indispensability.**
2. **Key steps**
 - a. Build competitive semiconductor fabs
 - b. Invest in mineral processing and refining
 - c. Develop hardware-software AI ecosystems
 - d. Control logistics, data, or digital platforms
 - e. Offer regulatory certainty and speed
3. In the new global order, **countries that control chokepoints shape outcomes.**

Conclusion

India's late entry into Pax Silica and MSP is a clear signal of how power is evolving in the global system. Strategic alignment, shared values, and diplomatic goodwill matter—but they no longer guarantee influence. The emerging tech order rewards **countries that bring assets, not assurances.**

If India wants to help shape the rules of the next technological era, it must invest urgently in **capability creation, supply-chain control, and platform power.** Pax Silica is not just about silicon—it is about **who defines the future of global technology and economic security.**



SECURITY

1. Punjab Border Fence Dispute

Context

1. Punjab shares a **532-kilometre-long international border** with **Pakistan**, secured by an **electrified barbed-wire fence** constructed mainly during the late 1980s, a period marked by militancy and cross-border infiltration.
2. Due to **uneven terrain and security considerations**, the **fence was erected several metres to nearly 2 kms** inside Indian territory at many locations.
3. This resulted in **large tracts of Indian farmland** being trapped between the fence and the International Border, subjecting farmers to heavy restrictions on access.
4. Recent indications that the Centre may consider shifting the fence have **revived long-standing debates** on **security, livelihoods, and adaptive governance** in sensitive border regions.

Q1. Why has the Punjab border fence created a conflict between national security and farmers' livelihoods, and how does this reflect the long-term consequences of emergency-era security policies?

1. The **inward placement of the border fence** converted legally owned farmland into a **restricted security zone**, directly affecting **farmers' ability** to freely access and cultivate their land.
2. **National security considerations** were **prioritised** during a period of militancy, with little scope for civilian consultation or resistance.
3. Measures introduced as **temporary security responses** gradually became **permanent administrative arrangements**.
4. Over time, this created a **structural imbalance** where **livelihood losses** were **normalised** in the name of security.
5. The issue reflects how **emergency-era decisions** can **produce long-term social and economic consequences** if not periodically reassessed.

Q2. What security conditions led to the construction of the Punjab border fence, and how relevant are those assumptions today?

1. The **fence was constructed in 1988** when Punjab faced **intense militancy, arms smuggling,** and

cross-border infiltration.

2. **Physical fencing** was considered **essential** to **slow militant movement** and **establish territorial control**.
3. Farmers did not openly protest due to fear and the extraordinary **security environment** of that time.
4. Today, **security threats** are **different** in nature and more **technologically mediated**.
5. This raises questions about whether static fencing should remain the **primary security strategy** decades later.

Q3. What is the extent of land and population affected by the fence, and how does restricted access impact agriculture and rural incomes?

1. Around **21,500 acres of privately owned land** and **nearly 10,000 acres of government land** lie beyond the fence.
2. Farmers can access these lands **only on designated days** and for **limited hours**.
3. **Delays in farming operations** affect irrigation schedules, **harvesting cycles,** and **crop quality**.
4. **Restricted access** increases **dependence on manual labour** and **reduces mechanisation efficiency**.
5. Over time, this **undermines income stability** and **discourages long-term agricultural investment**.

Q4. How do access controls and surveillance practices affect farmers' rights, farming efficiency, and trust in governance?

1. **Mandatory escorts** and **fixed entry timings** limit farmers' autonomy over their work.
2. **Agricultural decisions** are subordinated to **security schedules** rather than crop requirements.
3. **Excessive checks** foster a perception of suspicion toward ordinary citizens.
4. This **weakens trust** between border communities and security institutions.
5. Prolonged restrictions **erode confidence** in **responsive and citizen-centric governance**.

Q5. What mechanisms like the Kapoor Committee and compensation schemes were introduced, and why have they failed to provide lasting relief?

1. The **Kapoor Committee** acknowledged **farmers' difficulties** and recommended **compensation**.
2. An **inconvenience allowance** was introduced to **offset restricted access**.
3. **Payments** were **irregular** and not revised over time.
4. Compensation **addressed income loss** but **not structural access issues**.
5. Without **institutional follow-up**, these measures **gradually lost relevance**.

Q6. Why are farmers demanding relocation of the fence, and how does modern surveillance technology support their case?

1. Farmers argue that **improved surveillance reduces dependence** on inward fencing.
2. **Drones** and **sensors** can **monitor infiltration** without isolating farmland.
3. Shifting the fence would **restore normal agricultural practices**.
4. **Technology** enables **layered security** without excessive civilian hardship.
5. Farmers view **relocation** as a **rational adaptation** to modern security needs.

Q7. What security, administrative, and logistical hurdles have stalled the relocation of the Punjab border fence?

1. The **existing fence** is **old** and would require **complete dismantling**.
2. Reconstruction could temporarily **weaken border security**.
3. **Procurement** and **funding delays** slow implementation.
4. **Bureaucratic caution** discourages change to established systems.
5. **Political assurances** have often **lacked administrative execution**.

Q8. What lessons does the Punjab border fence issue offer for democratic governance and rights-based border management in India?

1. Security infrastructure must be **periodically reviewed**.
2. Livelihood concerns should be **integrated** into **border policy**.
3. **Technology** allows **flexible security arrangements**.
4. **Civil–military coordination** must include civilian welfare.
5. **Adaptive governance** strengthens legitimacy and trust.

Conclusion

The **Punjab border fence issue** highlights the **need to recalibrate security policies** in light of **evolving threats** and **technologies**. While border security remains essential, **prolonged civilian hardship** undermines **democratic governance** and **economic stability**. A balanced approach—combining **modern surveillance**, **selective fence realignment**, and **fair compensation**—can protect national interests while **restoring dignity** and **livelihoods** to **border communities**.

2. Smartphone Source Code Debate

Context

A recent report suggested that the Indian government was considering a proposal that would require smartphone manufacturers to **share their source code with third-party testing agencies** and **inform authorities before rolling out major software updates**. The Union government has since downplayed these claims and denied seeking access to proprietary source code. However, the report has triggered a wider debate on **national security**, **digital sovereignty**, **privacy**, **cyber-security**, and **ease of doing business** in India's rapidly expanding digital ecosystem.

Q1. What exactly did the report claim about the government's proposal regarding smartphone source code and software updates?

1. According to the report, the government was **exploring discussions**, not a final policy, on two possible requirements:
 - a. Smartphone makers may need to **submit source code** to third-party testing agencies
 - b. Companies may need to **notify the government before major software updates**
2. **Reported proposals**
 - a. Smartphone makers may need to **submit source code** to third-party testing agencies
 - b. Companies may need to **notify the government before major software updates**
3. **Government response**
 - a. The Union government **refuted claims** of mandatory source-code disclosure
 - b. Officials described discussions as **preliminary and exploratory**
4. The issue remains at the level of policy debate rather than formal regulation.

Q2. What is source code, and why is it considered the most sensitive component of any digital system, especially smartphones?

1. Source code is the **core set of instructions** that tells software how to function.
2. **Why it is critical**
 - a. Controls device behaviour, security, and data flow

- b. Contains proprietary algorithms and system architecture
 - c. Determines how vulnerabilities are patched
3. In smartphones, source code governs **communication, storage, encryption, and user privacy**, making it the most sensitive digital asset a company owns.

Q3. Why do smartphone manufacturers strongly resist sharing source code, even with governments or testing agencies?

1. Companies guard source code for **commercial, legal, and security reasons**.
2. **Key concerns**
 - a. Loss of intellectual property
 - b. Exposure of trade secrets
 - c. Risk of code leaks or misuse
3. Competitive disadvantage
4. Even when parts of Android are open-source, manufacturers heavily modify and customize it. These modifications are **closely protected assets**.

Q4. What security arguments could justify government interest in auditing or reviewing smartphone source code?

1. Governments worldwide are concerned about **national cybersecurity and digital infrastructure integrity**.
2. **Possible justifications**
 - a. Detect hidden vulnerabilities or backdoors
 - b. Prevent supply-chain cyber risks
 - c. Protect critical digital infrastructure
 - d. Ensure compliance with security standards
3. From a state perspective, smartphones are gateways to **financial systems, governance platforms, and personal data**, making security oversight a legitimate concern.

Q5. How could mandatory disclosure of source code potentially increase cybersecurity risks instead of reducing them?

1. Paradoxically, exposing source code can weaken security.
2. **Risks involved**
 - a. Malicious actors may identify exploitable flaws
 - b. Increased attack surface for cybercrime
 - c. Risk of leaks from third-party agencies

3. Security often relies on **controlled disclosure**, not full transparency. Open access without strict safeguards can undermine system resilience.

Q6. How does this issue intersect with concerns related to privacy, surveillance, and civil liberties?

1. Smartphones hold intimate details of personal life.
2. **Privacy concerns**
 - a. Fear of state overreach
 - b. Potential misuse of technical access
 - c. Erosion of trust between users and platforms
3. Even the perception of government access to device internals can create **chilling effects** on free expression and digital confidence.

Q7. What are the implications of such a proposal for India's technology industry, innovation climate, and foreign investment?

1. India aims to be a **global digital manufacturing and innovation hub**.
2. **Possible impacts**
 - a. Reduced investor confidence
 - b. Higher compliance costs
 - c. Hesitation by global firms to localise R&D
 - d. Risk to "ease of doing business" goals
3. Unclear or intrusive regulations can make India appear **regulatorily unpredictable**, affecting long-term technology partnerships.

Q8. How do other countries handle smartphone security, software audits, and update regulations?

1. Most countries avoid demanding full source-code disclosure.
2. **International practices**
 - a. Security certification and audits
 - b. Vulnerability disclosure frameworks
 - c. Hardware and software testing standards
 - d. Post-market surveillance
3. Even strong regulatory states rely on **standards-based audits**, not blanket access to proprietary code.

Q9. What would be a balanced and practical approach for India to ensure digital security without harming trust and innovation?

1. India must balance **security, privacy, and inno-**

vation.

2. Practical middle path

- a. Independent security audits without source-code ownership
 - b. Clear legal frameworks and safeguards
 - c. Focus on outcomes, not proprietary access
 - d. Strong data protection and cyber laws
3. Trust-based regulation backed by technical expertise is more effective than intrusive oversight.

Conclusion

The debate over smartphone source code reflects a deeper tension between **state security concerns and digital trust**. While governments have a legitimate interest in protecting national cybersecurity, demanding access to proprietary source code carries serious risks for privacy, innovation, and security itself. India's challenge lies in building **robust, transparent, and standards-based regulatory systems** that protect citizens without undermining the confidence of users and technology providers. In the digital age, **security is strongest when trust, law, and technology move together**.

3. Unlawful Activities (Prevention) Act (UAPA)

1. Background of UAPA

1. The **Constitution (Sixteenth Amendment) Act, 1963** empowered Parliament to impose **reasonable restrictions on Article 19** (Freedom of speech and expression) to protect **sovereignty and integrity** of the nation.
2. Based on this constitutional backing, the **Unlawful Activities (Prevention) Act (UAPA) was enacted in 1967**.
3. It was originally a law to deal with **anti-national and secessionist movements** in India.
4. **Main Provision:** The Central Government can **ban an organisation** if it **supports or promotes ideas or actions** that call for separating any part of India, or question **India's sovereignty and territorial integrity**, even through speeches, writings, or symbols.

2. Various Amendments of UAPA

1. 2004 Amendment:

- a. In 2004, after the **Prevention of Terrorism Act (POTA), 2002** was **repealed** due to allegations of misuse, **terrorism** was brought **under UAPA** (Chapter IV), making it an **anti-terror law**.
- b. It added:
 - i. Definition of **terrorist act** (Sec-

tion 15)

- ii. Punishments for terrorism
- iii. Criminalisation of conspiracy, recruitment, and training for terrorist activities

c. Terrorist acts now included:

- i. **Use of explosives, firearms, lethal weapons, poisons, chemicals, or hazardous substances**
- ii. **Intent to threaten the unity, integrity, security, or sovereignty of India**
- iii. **Acts intended to strike terror among the people** in India or any foreign country
- iv. **Abduction or kidnapping** to coerce the Indian government or any foreign government

2. 2008 Amendment:

- a. Following the **26/11 Mumbai Terror Attacks**, the UAPA was **significantly strengthened** to address global and domestic terror threats and to comply with **UN Security Council Resolution 1373**.
- b. **Key Changes** introduced:
 - i. Inserted the phrase "**by any other means**" in **Section 15**, making the definition **open-ended and extremely broad**.
 - ii. This allowed acts **not involving weapons or explosives** to be treated as terrorist acts if intent is alleged.
 - iii. Extended custody:
 1. Police custody: **15** → **30 days**
 2. Judicial custody: **90** → **180 days**
 - iv. **Anticipatory bail barred**
 - v. Bail denied if accusations are **prima facie true** (Section 43D(5))
 - vi. **Presumption of guilt** introduced (Section 43E) if the accused is found in possession of arms or material linked to terrorism
 - vii. Creation of **special courts** for speedy trial of UAPA cases.
- c. **NIA** (National Investigation Agency) was established to investigate the terror activities.

- d. This amendment is widely criticised for enabling **criminalisation of dissent**.

3. 2012 Amendment

- a. The scope of terrorism was expanded to include **“economic security of India”**.
- b. **Economic security** was **defined broadly** to include Financial security, Food security, Energy security, Livelihood security and Ecological and environmental security.
- c. **Production, smuggling, and circulation of counterfeit Indian currency** were declared **terrorist acts**.
- d. **Companies, trusts, and societies** were brought under UAPA liability through **Sections 22A, 22B, and 22C**.
- e. **Office-bearers** of such entities could be held criminally liable **unless they prove lack of knowledge**.
- f. The period for which an organisation could be declared an **unlawful association** was increased from **2 years to 5 years**.

4. 2019 Amendment

- a. The most recent amendment significantly expanded **executive powers** under UAPA.
- b. **Individuals can be designated as terrorists**, not just organisations.
- c. This can be done **without prior conviction**, raising concerns over **presumption of innocence**.
- d. **National Investigation Agency (NIA)** empowered to:
 - i. Seize properties connected to terrorism **without prior consent of state governments**.
 - ii. Investigation powers expanded:
 - 1. Earlier: only officers of **DSP/ACP rank**
 - 2. Now: **Inspector-rank NIA officers** can investigate UAPA cases
- e. Added the **International Convention for the Suppression of Acts of Nuclear Terrorism (2005)** to the schedule of treaties.

3. Other Major Provisions of UAPA

- 1. **Tribunal**: The Central Government can set up an **Unlawful Activities Prevention Tribunal**, headed by a **High Court judge**, to confirm and adjudicate the ban on organisations involved in

terrorist activities.

- 2. **Punishments under UAPA**: The Act prescribes graded punishments based on the severity of the terrorist act:

- a. **Death penalty or life imprisonment**: If the terrorist activity results in the **death of any person**.
- b. **Imprisonment of 5 to 10 years with fine**: For other terrorist acts such as **organising terrorist camps, conspiracy, or recruitment for terrorism**.
- c. **Minimum 5 years’ imprisonment with fine**: For acts that are **preparatory to the commission of a terrorist act**.

4. Limitations of UAPA

- 1. **Very broad definitions** of “unlawful activity” and “terrorist act” give wide discretion to authorities and can be misused.
- 2. **Low conviction rate**: NCRB data shows only **2–3% conviction**, while **more than 95% cases end in acquittal**, indicating excessive and weak prosecutions. **Strict bail provisions**: Bail is extremely difficult, leading to **long jail time before trial**, making bail itself a form of punishment.
- 3. **Long detention without charges**: Accused persons can be kept in jail for **up to 180 days without filing a chargesheet**, affecting personal liberty under **Article 21**.
- 4. **Burden of proof shifted to accused**: The accused has to prove innocence, which goes against basic principles of criminal law.
- 5. **Weak procedural safeguards**: Government is **not required to disclose evidence** for declaring someone a terrorist. Courts find it difficult to conduct effective judicial review at the bail stage.

Conclusion

The UAPA has evolved from a **narrow secession-control law (1967)** into a **powerful anti-terror statute** through **incremental and bipartisan amendments**.

While the objective of **national security** is legitimate, the **expansive definition of terrorism, stringent bail regime, and executive-heavy structure** have raised serious concerns regarding **civil liberties and misuse**.

The denial of bail in cases like the **Delhi riots** reflects how **Section 15 and Section 43D(5)** operate together, prioritising state security over personal liberty.

A balanced reform is required to ensure that **terrorism is punished without criminalising dissent**.



ECONOMY

1. De-dollarization

Q1. What is De-dollarization and why is it happening?

De-dollarisation refers to the process by which **countries reduce their dependence on the US dollar** for trade, reserves, payments and financial settlements.

It is happening because:

1. The U.S. has used its control over the dollar and global payment systems to impose financial sanctions.
2. After Russia's **reserves were frozen** and **banks were restricted** from the **SWIFT system**, many countries realised that **dollar dependence creates strategic risk**.
3. This led **Russia, China** and **others** to shift oil and trade settlements away from the dollar.
4. This is intensified as the US is planning for the **Russia Sanctions Bill** to **impose up to 500% tariffs** on countries buying oil from Moscow.

Q2. What is Petrodollar and why and when it emerged in the 1970s?

1. The **petrodollar** refers to the system in which **oil is priced, sold, and paid for in U.S. dollars**, meaning that countries must use dollars to buy crude oil in the global market.
2. The petrodollar system emerged in the **early 1970s**, after the collapse of the Bretton Woods system in 1971 and during the period of global oil shocks.
3. **Why did it emerge?**
 - a. After the U.S. dollar was taken off the gold standard, the U.S. needed a new way to maintain global demand for its currency.
 - b. An agreement was reached with Saudi Arabia and later OPEC that **oil would be sold only in U.S. dollars**.
 - c. Oil-exporting countries accepted this because the U.S. provided **security guarantees, military protection, and stable access to U.S. financial markets**.

Q3. How has the Petrodollar system increased US Hegemony and dollarization?

1. Global oil trade in dollars creates **constant worldwide demand** for the U.S. currency.

2. This keeps the dollar as the **main global reserve currency**, strengthening its dominance.
3. Oil importers must hold dollars, which **strengthens U.S. financial markets**.
4. High dollar demand allows the U.S. to **borrow cheaply and run large deficits**, without facing a currency crisis.
5. Dollar-based trade gives the U.S. **strong monetary and sanction power** over other countries.

Q4. What is Petroyuan? Why was Petroyuan started in 2017-18?

1. The petroyuan refers to **oil trade settled in Chinese yuan** instead of US dollars.
2. China launched yuan-based oil futures in **2017-18** to challenge the petrodollar.
3. Russia, Iran and some Gulf exporters have increasingly accepted yuan for energy sales, especially after Western sanctions.

Q5. What is the parallel infrastructure (SWIFT, CIPS, SPFS and BRICS Pay) to counter the US led Financial System?

1. **SWIFT** is the Western-controlled global messaging network used by banks to send payment instructions for international transactions.
2. Because most dollar payments pass through SWIFT-linked banks, the United States and its allies can monitor, block or sanction countries by cutting them off from this system.
3. **CIPS (Cross-Border Interbank Payment System)** was created by China to process international payments directly in Chinese yuan, without relying on SWIFT or the U.S. banking network.
4. **SPFS (System for Transfer of Financial Messages)** is Russia's alternative to SWIFT, developed after Western sanctions. It allows Russian banks and their partners to communicate and settle transactions even if they are cut off from the Western financial system.
5. **BRICS Pay** is being developed as a joint payment and settlement platform for BRICS countries. It is meant to allow trade and investment using **local currencies**, digital payments, or possibly a shared settlement unit instead of the U.S. dollar.
6. These systems make it harder for the US to enforce financial blockades.

Q6. What role does BRICS+ expansion play in the shift towards local currencies?

1. BRICS+ brings major oil and commodity producers (Saudi Arabia, UAE, etc.) into a non-US-aligned trading bloc.
2. This allows energy and raw-material trade to be settled in **local currencies instead of the dollar**.
3. As dollar use falls, **global demand for dollars declines**, weakening the petrodollar system.
4. India has paid for some Russian oil in **yuan** and is seeking **alternative settlement systems** to reduce dollar and sanctions risk.

Q7. How does the global EV revolution present a structural threat to the dollar?

1. EV adoption reduces **oil demand**, weakening the petrodollar system.
2. China leads EV production and battery supply chains, shifting energy dependence away from oil.
3. Less oil trade means less reliance on dollar settlements, eroding U.S. financial dominance.

Q8. What is the ultimate vision for a multi-polar financial strategy?

1. The vision is to create a **multipolar financial order** where no single currency dominates.
2. Local currencies, regional payment systems, and digital currencies (like Central Bank Digital Currencies - CBDCs) will coexist.
3. BRICS+ and G20 discussions highlight the need for **inclusive, resilient, and diversified financial systems**.
4. This reduces risks of sanctions and promotes fairer global trade.

2. 10-Minute Delivery and Labour Codes

Context

India's gig and platform economy has expanded rapidly. While the Union government considers the four Labour Codes as a step towards protecting gig workers, recent protests by platform workers have highlighted serious concerns related to safety, income security, regulation, and the future of work.

Q1. Why did gig and platform workers protest in December?

1. On December 31, more than one lakh gig and platform workers across India went on strike.
2. They submitted a **memorandum to the Union Labour Minister** demanding:

- a. Withdrawal of the 10-20 minute delivery model
 - b. Greater focus on worker safety
 - c. Protection from arbitrary penalties and account deactivations
3. The protest reflected wider issues of job insecurity, unsafe working conditions, and lack of social protection.

Q2. Why is the 10-20 minute delivery model controversial?

1. Nature of the Model

- a. Ultra-fast delivery is driven by competition among platforms, not by essential consumer needs.
- b. Companies adopted it to gain market share rather than improve welfare.

2. Impact on Workers

- a. Speed is extracted from human labour, not created by technology.
- b. Delivery workers face:
 - i. Time pressure
 - ii. Increased accident risks
 - iii. Unstable and unpredictable pay

3. Unequal Cost Distribution

- a. Technology and marketing budgets are treated as fixed costs.
- b. Labour is treated as a flexible and adjustable variable.
- c. Workers bear the hidden cost of "convenience".

Q3. Has quick commerce become economically and socially significant?

1. Rapid Market Growth

- a. From 2024 to 2027, quick commerce is projected to grow nearly threefold.
- b. The sector may reach ₹1-1.5 lakh crore in value.
- c. Online grocery is growing at 40-50% annually.

2. Employment Generation

- a. Platforms provide large-scale employment for low-skill workers.
- b. India adds nearly 20 million new workers annually but creates only about 2 million formal jobs.
- c. For many, gig work is the only immediate livelihood option.

3. Core Dilemma

- a. The debate is whether insecure work is better than unemployment.
- b. Economic necessity has turned fast delivery into a perceived “need”.

Q4. Why is regulation of gig platforms necessary?

1. Nature of Platform Control

- a. Platforms decide:
 - i. Pay rates
 - ii. Task allocation
 - iii. Incentives and penalties
 - iv. Ratings and account deactivation
- b. Workers are not truly independent.

2. Worker Demands

- a. Predictable minimum income
- b. Fair and transparent pay structures
- c. Protection from sudden ID blocking
- d. Accident insurance and basic social security
- e. Transparency in algorithmic decisions

3. Key Principle

- a. If platforms control work, they must carry legal and social obligations.
- b. This approach aligns with global regulatory trends.

Q5. Are the four Labour Codes sufficient for gig workers’ protection?

1. Limited Coverage

- a. Gig workers are mentioned under the **Social Security Code**.
- b. Benefits such as insurance and maternity support are discretionary, not enforceable rights.

2. Non-Mandatory Nature

- a. Welfare schemes depend on future government notifications and funding.
- b. Registration on the **e-SHRAM portal** does not guarantee tangible benefits like pensions or medical cover.

3. Exclusion from Labour Rights

- a. Gig workers are not classified as employees.
- b. They are denied:
 - i. Minimum wages
 - ii. Regulated working hours
 - iii. Paid leave and overtime

- iv. Collective bargaining rights

4. Algorithmic Blind Spots

- a. Labour Codes do not regulate:
 - i. Algorithmic pay cuts
 - ii. Task allocation logic
 - iii. Automated penalties or deactivation
- b. No clear grievance redressal or appeal mechanism exists.

Q6. What are the counter-arguments against strict regulation?

1. Risk of Killing Job Creation

- a. Making gig work equivalent to full-time employment may reduce platform hiring.
- b. High worker turnover suggests flexible labour supply.

2. Investment Concerns

- a. Platforms are still struggling for profitability.
- b. Over-regulation may deter public and private investment.

3. Evolving Legal Framework

- a. Labour Codes are still being operationalised.
- b. Gradual strengthening is preferred over rigid rules.

Q7. What does the future hold for gig work amid AI and automation?

1. Projected Growth

- a. A report by **NITI Aayog** estimates that 2.35 crore workers may join the gig economy by 2029-30.

2. Impact of AI

- a. AI may automate task allocation, ratings, and worker replacement.
- b. This could increase efficiency but reduce worker voice and security.

3. Long-Term Employment Challenge

- a. Sustainable employment growth requires strengthening manufacturing, construction, and labour-intensive sectors.
- b. Quick commerce offers immediate jobs, but not long-term security.

Conclusion

The gig economy cannot remain a labour vacuum. Employment growth must be matched with enforceable social security, algorithmic accountability, and clear legal responsibility, ensuring technology enhances efficiency without eroding worker dignity.

3. Apple Imports and Farmer Distress

Context

1. Himachal Pradesh and Jammu & Kashmir have raised concerns over India's decision to cut import duty on New Zealand apples under a Free Trade Agreement.
2. Apple farming is the backbone of hill economies and supports lakhs of small and marginal farmers.
3. The issue highlights the tension between trade liberalisation and protection of vulnerable agricultural livelihoods.

Q1. Why has the issue of apple import duty resurfaced?

1. India reduced import duty on New Zealand apples from 50% to 25% for April–August under the India–New Zealand FTA.
2. Himachal Pradesh has demanded:
 - a. Raising import duty to 100%.
 - b. A seasonal import ban from July to November.
3. Apples account for nearly 80% of Himachal Pradesh's fruit output.
4. About 2.5 lakh farmers in Himachal Pradesh depend directly on apple cultivation.
5. Jammu & Kashmir has echoed similar concerns, warning of severe income losses for growers.

Q2. What does the India–New Zealand FTA provide on apple imports?

1. Import duty was reduced to 25% under a quota system.
2. Quota details:
 - a. 32,500 metric tonnes in the first year.
 - b. Rising to 45,000 metric tonnes by the sixth year.
3. Minimum Import Price (MIP) fixed at \$1.25 per kg.
4. Imports beyond the quota continue to attract 50% duty.
5. The provision is aimed at trade facilitation but raises concerns about uneven competition.

Q3. Why are Jammu & Kashmir and Himachal Pradesh most affected?

1. India's annual apple production is around 28 lakh metric tonnes.
2. Regional contribution:
 - a. Jammu & Kashmir: ~20 lakh metric tonnes.
 - b. Himachal Pradesh: ~5–6 lakh metric

tonnes.

3. Apple economy valuation:
 - a. Jammu & Kashmir: ~₹12,000 crore.
 - b. Himachal Pradesh: ~₹4,500 crore.
4. Apple farming in both States is dominated by:
 - a. Small and marginal growers.
 - b. High dependence on seasonal income.

Q4. How do apple imports affect domestic marketing and prices?

1. Indian apples are harvested between July and November.
2. Off-season sales rely on:
 - a. Cold storage.
 - b. Controlled Atmosphere (CA) facilities.
3. New Zealand apples:
 - a. Harvested between January/February and May.
 - b. Enter Indian markets when domestic farmers sell stored produce.
4. Reduced duty from April to August overlaps with:
 - a. Arrival of Gala apples in June.
 - b. Marketing of Royal Delicious by September.
5. Cheaper imports are expected to:
 - a. Depress domestic prices.
 - b. Reduce market share of Indian apples.
 - c. Increase unsold stocks.

Q5. What challenges do domestic apple growers already face?

1. Climate-related stresses:
 - a. Reduced snowfall.
 - b. Erratic rainfall and prolonged dry spells.
 - c. Floods, cloudbursts, and landslides.
2. Rising disease burden:
 - a. Apple scab.
 - b. Fire blight.
 - c. Powdery mildew.
 - d. Bitter rot and sooty blotch.
3. Production losses:
 - a. Himachal output fell by nearly 28% in 2023 after floods.
 - b. In 2025, nearly 1 lakh metric tonnes rejected due to poor quality.
4. Infrastructure bottlenecks:
 - a. Frequent closure of Jammu–Srinagar National Highway.

- b. Delayed market access during peak harvest.
- c. Heavy post-harvest losses.

Q6. What are farmers demanding from the government?

1. Raising import duty on foreign apples to 100%.
2. Seasonal import ban during July–November.
3. Special category protection for hill apple farmers.
4. Higher subsidies and income support.
5. Expansion of crop insurance coverage.
6. Support for climate-resilient varieties and orchard rejuvenation.
7. Improved storage, grading, and transport infrastructure.

Q7. What is the broader policy dilemma involved?

1. Trade liberalisation under FTAs increases consumer choice but exposes farmers to import competition.
2. Apple cultivation is:
 - a. Climate-sensitive.
 - b. Capital-intensive.
 - c. Dependent on timely market access.
3. Tariff reductions without domestic safeguards can aggravate rural distress.
4. Highlights need for balancing:
 - a. International trade commitments.
 - b. Livelihood security of farmers.

Q8. What is the Way Forward?

1. Use of WTO-compliant safeguard measures for sensitive crops.
2. Time-bound seasonal tariffs instead of blanket bans.
3. Investment in:
 - a. Climate-resilient apple varieties.
 - b. Cold chains and CA storage.
 - c. Disease surveillance and extension services.
4. Strengthening crop insurance and disaster compensation.
5. Promoting value addition, processing, and exports to improve farmer incomes.

Conclusion

The apple import dispute reflects deeper vulnerabilities in India's horticulture sector. A calibrated trade policy, combined with strong domestic support, is essential to protect farmers while honouring global trade commitments.

4. BRICS Digital Currency Linkage

Context

1. The **Reserve Bank of India** has reportedly suggested that **India use its BRICS chairmanship in 2026** to promote collaboration among BRICS members on using **Central Bank Digital Currencies for cross-border payments**.
2. The proposal reflects growing interest among **emerging economies** in reducing transaction costs, improving settlement efficiency, and lowering reliance on the US dollar-dominated global payment architecture.
3. However, **differences in regulatory frameworks, cyber security preparedness, and geopolitical sensitivities** make the proposal complex and necessitate a cautious, phased approach.

Q1. What is the RBI's proposal regarding BRICS digital currency linkage, and why has it gained relevance in the current global financial order?

1. The RBI has proposed **exploring the use of CBDCs** for cross-border payments among BRICS countries.
2. The idea is to create a **common or interoperable digital payment framework**.
3. It would cover both **founding BRICS members and newly inducted countries**.
4. The proposal has gained relevance due to **rising costs and delays** in traditional cross-border payments.
5. **Increasing weaponisation** of the **dollar-based financial system** has heightened interest in alternatives.
6. Emerging economies seek **greater monetary autonomy and resilience**.
7. India sees this as an **opportunity to shape new global payment norms**.

Q2. What are Central Bank Digital Currencies (CBDCs), and how are they structurally different from UPI and private cryptocurrencies?

1. CBDCs are **sovereign digital currencies** issued by central banks as **legal tender**.
2. In India, the **e-rupee** is a **digital form** of physical currency.
3. CBDCs **transfer value directly** between digital wallets, not bank accounts.
4. **UPI**, in contrast, is **only a payment messaging system** between bank accounts.
5. CBDCs are **centrally regulated and backed** by the **state**.

6. **Private cryptocurrencies** are **decentralised** and lack sovereign backing.
7. CBDCs therefore **combine digital efficiency** with **monetary stability**.

Q3. How could a BRICS-wide CBDC payment framework improve efficiency in cross-border trade and settlements?

1. CBDCs can significantly **reduce transaction costs** by removing intermediaries.
2. **Settlement times** could be **reduced** from days to near-instant execution.
3. **Exchange rate conversions** can be **streamlined** within the payment framework.
4. Small and medium exporters would benefit from **faster liquidity cycles**.
5. Trade invoicing and settlement could become **more predictable**.
6. **Operational frictions** in correspondent banking would **decline**.
7. Overall **trade integration** within BRICS would **deepen**.

Q4. In what ways can CBDC-based cross-border payments strengthen transparency, traceability, and financial regulation?

1. CBDC transactions are **recorded on secure digital ledgers**.
2. These ledgers **create permanent and tamper-proof transaction trails**.
3. Regulators **can trace funds** across borders in **real time**.
4. **Illicit activities** like money laundering become **easier to detect**.
5. **Compliance rules** can be embedded directly into transactions.
6. **Monitoring costs** for regulators are **reduced**.
7. This **enhances trust** in cross-border financial flows

Q5. Why is reducing dependence on the US dollar a strategic motivation behind BRICS digital currency cooperation?

1. The **US dollar dominates** global trade and financial settlements.
2. **Dollar dependence** exposes countries to **external monetary tightening**.
3. **Sanctions and payment restrictions** disrupt trade with certain partners.
4. BRICS countries **seek greater control** over trade settlements.

5. CBDCs offer an **alternative** to dollar-based systems like SWIFT.
6. Reduced dollar reliance **enhances economic sovereignty**.
7. It also **strengthens South–South financial cooperation**.

Q6. What regulatory and technological challenges complicate the implementation of CBDC-based cross-border payments among BRICS nations?

1. BRICS countries have **diverse legal and regulatory systems**.
2. Harmonising these frameworks is **complex and time-consuming**.
3. CBDC technologies are at **different stages of development**.
4. **Ensuring interoperability** between digital currencies is difficult.
5. **Data protection and privacy standards** vary across countries.
6. **Institutional capacity** differs among members.
7. These **gaps delay** practical implementation.

Q7. What financial stability and cyber security risks could arise from cross-border use of CBDCs?

1. Rapid cross-border flows could **increase capital volatility**.
2. Weak safeguards may amplify **financial contagion risks**.
3. **Cyber attacks** could target interconnected digital payment systems.
4. **System-wide failures** could have **cross-border spillovers**.
5. Central banks would **need robust risk-management frameworks**.
6. Consumer protection mechanisms must be clearly defined.
7. **Stability concerns** require strong coordination among regulators.

Q8. How might geopolitical reactions, particularly from the United States, affect India's participation in BRICS CBDC initiatives?

1. The US views efforts to **reduce dollar dominance** with concern.
2. Past statements have warned of **retaliatory trade measures**.
3. India already faces **high tariff exposure** in US markets.

4. Aggressive CBDC cooperation could **invite economic pressure**.
5. Trade and technology **relations** may be **affected**.
6. India must **assess costs** alongside strategic benefits.
7. **Diplomatic signalling** becomes **crucial**.

Q9. What should be India's calibrated strategy toward BRICS digital currency linkage to balance long-term gains and short-term risks?

1. India should **support pilot projects** before full-scale adoption.
2. **Regulatory harmonisation** should precede operational rollout.
3. **Cyber security and data sovereignty** must be prioritised.
4. **Coordination** with like-minded partners should be **strengthened**.
5. Engagement should remain **non-confrontational geopolitically**.
6. Economic **risks** must be continuously **assessed**.
7. A **phased approach** ensures **stability** and **credibility**.

Conclusion

The RBI's proposal for BRICS digital currency linkage reflects India's aspiration to **modernise cross-border payments, enhance financial sovereignty, and shape emerging global monetary norms**. While the long-term strategic benefits are significant, the initiative carries **regulatory, technological, and geopolitical risks** that demand caution. A **gradual, well-coordinated, and diplomatically sensitive approach** will allow India to harness the advantages of CBDCs while **safeguarding financial stability and external economic relations**.

5. Export Preparedness Index (EPI) 2024

Context

The **Export Preparedness Index (EPI) 2024**, released by NITI Aayog, provides a **comprehensive, multi-dimensional assessment** of India's States and Union Territories on their readiness to promote exports. The index aligns with India's strategic objective of achieving **USD 1 trillion in merchandise exports by 2030** and supports the broader vision of **Viksit Bharat @2047**. Unlike conventional export rankings, EPI recognises that exports are not generated by firms alone but emerge from **ecosystems shaped by infrastructure, governance, human capital, and market access**.

Q1. What is the Export Preparedness Index (EPI) 2024, and why is it significant for India's

export-led growth strategy?

1. The Export Preparedness Index 2024 is a **diagnostic and benchmarking framework** that evaluates how well States and UTs are positioned to enable exports.
2. From a development economics perspective, exports act as:
 - a. A driver of productivity growth
 - b. A source of foreign exchange
 - c. A channel for technology transfer
3. **Why EPI matters for India**
 - a. India's export capacity is **spatially uneven**
 - b. States play a critical role in infrastructure, labour, and regulation
 - c. National targets cannot be achieved without sub-national readiness
4. EPI 2024 translates macro export ambition into **micro-level governance action**.

Q2. How is the EPI 2024 framework structured in terms of pillars, sub-pillars, indicators, and weightages, and what does this reveal about India's export priorities?

1. EPI 2024 adopts a **systems approach** to export competitiveness.
2. **Framework structure**
 - a. **4 pillars**
 - b. **13 sub-pillars**
 - c. **70 indicators**
3. **Pillars and weightage**
 - a. Export Infrastructure – 20%
 - b. Business Ecosystem – 40%
 - c. Policy & Governance – 20%
 - d. Export Performance – 20%
4. This reflects the idea that **comparative advantage today is created, not inherited**.
5. Business conditions and institutions matter more than natural endowments alone.

Q3. Why is export infrastructure treated as a foundational pillar in EPI 2024, and how does it influence trade competitiveness?

1. Infrastructure determines the **cost, speed, and reliability** of exports.
2. According to trade cost theory, even small logistics delays can:
 - a. Reduce export volumes
 - b. Eliminate low-margin exporters (espe-

cially MSMEs)

3. Infrastructure components assessed

- a. Ports, railways, roads, air cargo
- b. Warehousing and cold chains
- c. Power and water reliability

4. States with efficient infrastructure reduce **transaction costs**, enabling firms to compete in time-sensitive global markets.

Q4. How does the Business Ecosystem pillar reflect modern theories of export competitiveness and industrial development?

1. The Business Ecosystem pillar carries the highest weight because exports depend on **firm-level competitiveness**.
2. **Key elements**
 - a. Cost of production (power, water, labour)
 - b. Human capital and skills
 - c. MSME depth and scale
 - d. Industrial clusters and innovation
3. This aligns with **New Trade Theory** and **Porter's competitiveness framework**, which emphasise productivity, clusters, and learning effects over mere scale.

Q5. Why are policy and governance considered decisive factors for export preparedness in a federal economy like India?

1. Exports are deeply affected by **institutional quality**.
2. **Governance dimensions**
 - a. Predictability of regulations
 - b. Digital clearance systems
 - c. Trade facilitation and standards compliance
 - d. Export promotion agencies
3. **Federal relevance:** In India, states control land, labour, utilities, and local clearances. Effective governance lowers uncertainty and **encourages long-term export-oriented investment**.

Q6. What does the Export Performance pillar measure, and why is outcome-based assessment essential for credible policy evaluation?

1. Preparedness must translate into outcomes.
2. **What is measured**
 - a. Export growth and stability
 - b. Product and market diversification
 - c. District-level export participation
3. **Why outcome-based evaluation matters**

- a. From a public policy perspective, performance indicators:
 - i. Prevent “policy on paper”
 - ii. Encourage accountability
 - iii. Highlight implementation gaps
- b. This ensures EPI is **action-oriented**, not merely descriptive.

Q7. How does the Leaders–Challengers–Aspirers (LCA) framework strengthen cooperative federalism in export promotion?

1. The Leaders–Challengers–Aspirers framework recognises **asymmetric development**.
2. **Benefits of LCA**
 - a. Encourages peer learning
 - b. Avoids unfair comparisons
 - c. Motivates reform through competition
3. **Federal logic:** It supports **competitive-cum-cooperative federalism**, where states learn from best practices rather than chase uniform benchmarks.

Q8. What insights does EPI 2024 offer regarding India's integration into global value chains (GVCs)?

1. EPI 2024 highlights a shift toward **value-added exports**.
2. **Emerging patterns**
 - a. Growth in electronics and engineering exports
 - b. Strong pharmaceutical and chemical base
 - c. District export hubs gaining importance
3. **GVC perspective:** Successful GVC integration requires:
 - a. Reliable logistics
 - b. Skilled labour
 - c. Standards compliance
4. States scoring high on EPI are better positioned to move **up the value chain**, not just export raw goods.

Q9. What strategic policy lessons emerge from EPI 2024 for strengthening India's export ecosystem?

1. EPI 2024 offers a **reform roadmap**.
2. **Key lessons**
 - a. Move from incentive-driven to ecosystem-driven export policy
 - b. Strengthen district export promotion

- committees
 - c. Invest in logistics and trade facilitation
 - d. Integrate MSMEs into global supply chains
 - e. Use data for continuous policy monitoring
3. Export success must be **broad-based, resilient, and institutionally anchored**.

Conclusion

The **Export Preparedness Index 2024** represents a mature shift in India's export strategy—from headline targets to **ground-level capability building**. By highlighting the role of infrastructure, business ecosystems, governance, and outcomes, EPI reinforces the idea that exports are not accidental but **policy-enabled and institutionally sustained**. As India advances toward its trillion-dollar export ambition, EPI 2024 serves as a vital instrument for aligning **state capacity, federal cooperation, and global competitiveness**.

6. India's Skilling Gap

Context

1. Over the last decade, India has built one of the **world's largest skilling ecosystems** through **flagship programmes** like **Pradhan Mantri Kaushal Vikas Yojana (PMKVY)**.
2. However, despite large numbers trained, **skilling has not emerged as a preferred pathway** for youth, and employability outcomes remain weak.
3. This has **renewed debate** on why **India's skilling system is not delivering meaningful labour-market results**.

Q1. Why Has India's Large Skilling Ecosystem Failed to Deliver Strong Employability Outcomes?

1. **Scale without outcomes**
 - a. Between **2015 and 2025**, PMKVY trained and certified **around 1.40 crore candidates**.
 - b. Yet, skilling is **not aspirational** and is rarely seen as an alternative to formal degrees.
 - c. **Periodic Labour Force Survey** data show that **wage gains from vocational training are modest and inconsistent**, especially in the informal sector, where most workers are employed.
2. **Low formal vocational training**
 - a. Only **about 4.1% of India's workforce** has received formal vocational training, **up from about 2% a decade ago** (PLFS; World Bank).

- b. In contrast, **OECD countries** have around **44% enrolment in vocational streams** at the **upper-secondary level**, rising to **70%** in countries like Austria and Finland.
- c. This shows that India's skilling ecosystem remains **peripheral**, not mainstream.

Q2. Why Has Skilling Not Become Aspirational?

1. India's **Gross Enrolment Ratio (GER)** in higher education is **28%**, and **National Education Policy 2020** aims to raise it to **50% by 2035**.
2. This expansion cannot rely only on academic degrees; **skills must be integrated into higher education pathways**.
3. The **India Skills Report 2025** shows that post-degree skilling is **not common behaviour** among graduates.
4. As long as skilling remains **separate from degrees**, youth will continue to see it as a **second-choice or fallback option**.

Q3. Why is Industry Participation Limited?

1. Industry is the **largest beneficiary** of skilled labour, yet participation remains weak.
2. **High attrition** (employees leaving their jobs from an organisation over a period of time) **rates (30-40%** in sectors like retail, logistics, hospitality, manufacturing) impose major costs.
3. Despite this, most employers **do not treat public skilling certificates as hiring benchmarks**.
4. Instead, they rely on **internal training, referrals, or private platforms** (as noted by NITI Aayog and the World Bank).
5. **Apprenticeships**
 - a. The **National Apprenticeship Promotion Scheme** has increased participation, but the benefits are uneven and large companies participate only to a limited extent.
 - b. Industry is **not properly encouraged or required** to help design training content, assessments, or certification standards.
 - c. As a result, skilling is something industry **uses after training is done, rather than actively shaping it** from the beginning.

Why Do Sector Skill Councils (SSCs) Lack Credibility?

1. SSCs were created to be **industry-facing institutions** that define standards, ensure relevance, and anchor employability.
2. In practice, the skilling value chain is **fragmented**:

- a. Training by one agency
 - b. Assessment by another
 - c. Certification by SSCs
 - d. Placement often missing
3. Unlike universities or polytechnics, **no reputational risk or accountability** exists for poor outcomes.
 4. Employer surveys show that **SSC certificates have weak signalling value**, compared to degrees or prior experience.
 5. In contrast, industry-led certifications (e.g., cloud or digital certifications) work because:
 - a. The certifier’s credibility is at stake
 - b. Assessments are graded, not binary
 - c. Employers know exactly what skills are certified
 6. SSCs focus mainly on **standards creation**, not **employment outcomes**, which erodes trust.

Q4. How Can Skilling Support Sustained Economic Growth?

1. India’s skilling problem is **not due to lack of funding or intent**, but due to **weak accountability**.
2. Solutions include:
 - a. Expanding apprenticeships and **embedding skills in workplaces**
 - b. Stronger industry ownership in programme design
 - c. Reforms such as **PM-SETU**, which modernises ITIs with industry involvement
3. When skills are embedded in degrees, industry becomes a co-owner and SSCs are accountable for placements, then skilling can shift from a **welfare intervention** to a **core growth strategy**.

Challenges and Way Forward

| Challenges | Way Forward |
|--|--|
| Skilling seen as second-choice pathway | Integrate skilling into higher education and degree programmes |
| Low formal vocational training coverage | Scale workplace-linked training and apprenticeships |
| Limited industry participation | Incentivise and mandate industry co-design of curriculum and assessments |
| Fragmented skilling value chain | Assign clear ownership from training to placement |

| | |
|---|--|
| Weak credibility of SSC certifications | Make SSCs accountable for employability and placement outcomes |
| Informal sector absorption with low wage gains | Link certification to real job roles and productivity improvements |

Conclusion

India’s skilling challenge is not one of scale, but of outcomes. By **integrating skills with education, treating industry as a co-owner, and holding institutions accountable for employability**, skilling can become a **pillar of productivity, dignity of labour, and sustained economic growth**.

7. State of the Economy: RBI’s Growth Assessment

Context

The **Reserve Bank of India** in its *State of the Economy* article analysed India’s macroeconomic conditions using **high-frequency data for December 2025**. The assessment highlights **continued growth momentum, resilient domestic demand, and optimism for future prospects** despite elevated **global geopolitical and geo-economic risks**. The article reflects the views of the authors, not the formal policy stance of the RBI.

Q1. What do high-frequency indicators suggest about India’s domestic demand and economic activity in December 2025?

1. High-frequency data for December 2025 indicate **sustained buoyancy in growth impulses**, with domestic demand remaining lively even amid external risks.
2. Retail automobile sales grew broadly across categories, reflecting **strong household consumption and rural pickup**.
3. Commercial vehicle sales maintained strong momentum, signalling **improved goods movement and underlying economic activity**.
4. E-way bill generation—a key formal economy indicator—continued healthy growth, driven by **GST rate rationalisation, year-end stock clearances, and firm business activity**.
5. Together, these signals show that **production and consumption cycles remained robust**, supporting overall economic resilience.

Q2. What is India's projected GDP growth for FY2025-26 according to the National Statistics Office's first advance estimates, and why is it significant?

1. The National Statistics Office's first advance estimate projects **real GDP growth of 7.4% for FY2025-26**, up from 6.5% in the previous year.
2. This growth rate positions India to remain one of the **fastest-growing major economies globally** at a time when many advanced economies face slowdown.
3. Higher output growth reflects **strengthening domestic drivers**—consumption, investment, and formal economic activity.
4. The sustained high growth is noteworthy given global trade uncertainties and geopolitical tensions.
5. It signals confidence in India's medium-term growth trajectory and underpins policy optimism.

Q3. How did inflation trends evolve in December 2025, and what macroeconomic implications do they carry?

1. In December 2025, **CPI inflation rose modestly to around 1.3%**, influenced by slower food deflation and slightly higher core price pressures.
2. Despite the uptick, inflation remained **well below the RBI's 2–6% target band**, indicating subdued price pressures.
3. Low headline inflation reflects broader disinflationary forces, including weak global commodity prices and improving supply conditions.
4. Benign inflation provides **room for accommodative monetary policy** to support growth.
5. However, policymakers remain vigilant about risks from **imported inflation** due to volatile energy and food markets.

Q4. Why are global geopolitical and geo-economic risks key to interpreting India's economic outlook, and what are their potential implications?

1. At the start of 2026, several global risk factors have the potential to affect economic stability—such as **US intervention in Venezuela, contin-**

ued Middle East conflicts, uncertainty over the Russia–Ukraine peace process, and rising tensions in the Arctic region.

2. These geopolitical developments create **geo-economic uncertainty**, affecting global trade, supply chains, and investor confidence.
3. Such risks can influence India's external sector via **trade disruptions, energy price volatility, and capital flow fluctuations.**
4. Elevated policy uncertainty can constrain export demand and foreign investment.
5. As a result, even a strong domestic economy must be read in the context of these broader global stressors.

Q5. Which major structural reforms in 2025 are underscored in the RBI assessment, and how might they strengthen fundamentals?

1. The RBI highlights several structural reforms completed or advanced in 2025, including **GST rate rationalisation** and simplification of the indirect tax regime.
2. Implementation of **new labour codes** aims to streamline labour market regulations, increasing flexibility and formal employment.
3. **Financial sector deregulation** reforms enhance market functioning and credit flows.
4. These reforms are expected to improve **productivity, investment climate, and ease of doing business.**
5. Over the medium and long term, such reforms strengthen Indian economic fundamentals by enhancing **competitiveness and growth potential.**

Q6. How is India pursuing export diversification and trade strategy as part of its external sector resilience?

1. India has stepped up efforts to **diversify export destinations**, focusing on emerging markets in Africa and Latin America.
2. Active trade negotiations are underway with about **14 countries or regional groups**, spanning nearly 50 nations, including the European Union and Gulf Cooperation Council countries.
3. Diversification mitigates dependence on any sin-

gle market and reduces vulnerability to external shocks.

4. Broader engagement supports market access and enhances India's role in global value chains.
5. Strengthening export competitiveness aligns with India's strategic goal of enhancing external sector resilience.

Q7. What challenges does the Indian economy face despite strong domestic demand, and what policy responses are suggested?

1. Persisting global geopolitical instability poses a downside risk that could affect trade and investment flows.
2. There is a risk of **imported inflation**, especially due to volatile global energy and commodity markets.
3. Balancing growth with inflation management requires a **mix of monetary, fiscal, and trade policies**—including interest rate adjustments and strategic tariff reforms.
4. Ensuring inclusive growth calls for deepening structural reforms to boost productivity and widen economic participation.
5. Managing policy uncertainty demands **prudent regulation, strong macro-prudential oversight, and responsive fiscal strategies**.

Q8. How does the RBI reconcile domestic resilience with external uncertainties in its overall economic outlook?

1. The RBI's assessment emphasises that while **domestic demand and economic activity remain robust**, global uncertainties cannot be ignored.
2. Strong inland indicators such as consumption growth and formal sector activity provide optimism for sustained momentum.
3. The central bank underscores the significance of structural reforms and prudent policy calibration to navigate global headwinds.
4. India's economy is expected to sustain high growth while remaining attentive to inflationary and external risks.
5. This balanced outlook supports confidence in medium-term growth prospects **despite global geopolitical volatility**.

Q9. What broader insights does the RBI's assessment offer on India's economic strategy in a volatile global environment?

1. The RBI's State of the Economy article illustrates that **strong domestic demand can anchor growth even when external conditions are uncertain**.
2. High-frequency indicators provide real-time insights, enabling quicker policy responses.
3. Export diversification and structural reforms enhance resilience against external shocks.
4. Monetary and fiscal coordination remains crucial for sustaining growth without inflation overshoot.
5. India's continued high growth performance reflects a dynamic economic strategy combining **internal strengths with external engagement**.

Conclusion

The RBI's *State of the Economy* assessment for December 2025 highlights **India's resilient growth path**, underpinned by robust domestic demand, buoyant high-frequency indicators, and a sustained reform push. While inflation remains subdued and manageable, global geopolitical risks persist and warrant continued policy vigilance. India's macroeconomic fundamentals, combined with calibrated policy responses, provide **credible grounds for optimism** and position the economy for **sustained and stable long-term growth**—even in a volatile global environment.



SCIENCE AND TECHNOLOGY

1. India's Space Programme

Context

India's space programme gained renewed public attention in **2025-26** due to major milestones such as an Indian astronaut interacting with the Prime Minister from the **International Space Station**, progress in **Gaganyaan**, rapid growth of **private space startups**, and the articulation of a long-term vision for India's space leadership during **Amrit Kaal**.

Q1. What is India's Space Programme?

India's space programme, led by **Indian Space Research Organisation**, has evolved from a mission-oriented scientific effort into a **people-centric national capability** that supports governance, economy, security, and global cooperation.

Evolution through key missions

1. **Chandrayaan-1 (2008)** confirmed the presence of **water molecules on the Moon**.
2. **Chandrayaan-2 (2019)** mapped the Moon in high precision and prepared technology for future landings.
3. **Chandrayaan-3 (2023)** made India the **first country to soft-land near the lunar south pole**.
4. **Mars Orbiter Mission (2014)** made India the **first Asian country to reach Mars orbit and the only one to do so on its maiden attempt**.
5. **Aditya-L1** studies the Sun's corona and space weather.
6. **XPoSat (2024)** studies black holes and extreme cosmic phenomena.
7. **SpaDeX** successfully demonstrated **in-orbit docking**, a key capability for future space stations.

India has also launched **over 400 foreign satellites**, making it a trusted and cost-effective global launch partner.

Q2. Why Does India's Space Programme Matters?

India's space programme matters because it:

1. **Builds national capability and pride** by placing India among leading spacefaring nations.
2. **Supports daily governance**, including disaster management, weather forecasting, fisheries advisories, crop assessment, railway safety, and infrastructure planning under **PM Gati Shakti**.
3. **Strengthens strategic autonomy** in a critical frontier involving communication, navigation,

and surveillance.

4. **Inspires youth and STEM education**, creating a pipeline of scientists, engineers, and innovators.
5. **Drives economic growth**, innovation, and employment through the expanding space economy.

Space in India has moved from being a **scientific luxury** to a **democratic public utility**.

Q3. How is India Expanding its Space Capability?

1. **Human Spaceflight and Exploration Roadmap**
 - a. **Gaganyaan** aims to send Indian astronauts to space by **2027**, with an approved outlay of **₹20,000+ crore**.
 - b. Four Indian Air Force test pilots are undergoing astronaut training.
 - c. India plans to build a **Bharatiya Antariksh Station (BAS)** by **2035** and achieve an **Indian human Moon landing** by **2040**.
2. **Policy and Institutional Expansion**
 - a. The government has **opened the space sector to private players**, leading to **350+ startups** working on satellites, launch vehicles, and downstream services.
 - b. India's space budget increased from **₹5,615 crore (2013-14)** to **₹13,416 crore (2025-26)**, with an additional **₹5,000 crore in user funds**.
3. **Economic and Technological Push**
 - a. India's space economy is valued at **\$8 billion**, projected to grow to **\$44 billion**.
 - b. Focus areas include **semi-cryogenic engines, electric propulsion, quantum communication, in-orbit servicing, robotics, and autonomy**.
 - c. The government has set a target of **five space unicorns** and scaling launches to **50 per year**.
4. **Youth and Skill Development**
 - a. Hosting the **International Olympiad on Astronomy and Astrophysics (2025)** with participation from **60+ countries**.
 - b. Initiatives like **ISRO Robotics Challenge** and **Bharatiya Antariksh Hackathon** connect students directly with space technology.

Implications

- Governance:** Better disaster preparedness, climate monitoring, and infrastructure planning.
- Economy:** Job creation, startup growth, and export opportunities in high-tech sectors.
- Security:** Enhanced surveillance, communication, and strategic deterrence.
- Global standing:** India emerges as a **reliable space partner** and norm-shaper.
- Society:** Greater scientific temper and aspiration among youth.

Challenges and Way Forward

| Challenges | Way Forward |
|---|--|
| High cost of space missions and technological complexity | Strengthen public-private partnerships and promote indigenous manufacturing to reduce costs and improve efficiency. |
| Shortage of skilled manpower in advanced space technologies | Expand specialised training programmes , deepen collaboration between universities and ISRO, and invest in long-term skill development. |
| Intense global competition in launch services and satellite markets | Focus on India's strength in low-cost, high-reliability missions and continuously improve launch frequency and success rates . |
| Need for better coordination across multiple missions, users, and agencies | Implement a clear 15-year integrated space roadmap aligned with the vision of Viksit Bharat 2047 to ensure mission synergy. |
| Requirement of sustained and predictable funding for long-term goals | Encourage commercial revenues , user-based services, private investment , and international collaboration to supplement government funding. |

2. Polar Satellite Launch Vehicle (PSLV)

Q1. Why was there a need to develop PSLV (Background)?

- Earlier Indian rockets (like Satellite Launch vehicle (SLV) & Augmented SLV) had **limited payload capacity** (maximum mass a rocket can carry) & **low reliability**, so India **depended on foreign launch services**.

- India needed a **cost-effective and indigenous launcher** to support **agriculture, disaster management, Earth observation, and resource mapping** using **IRS (Indian Remote Sensing) satellites**.
- The PSLV programme, started in the **early 1980s under leaders like Dr. A.P.J. Abdul Kalam** addressed this gap by creating a **four-stage solid-liquid rocket** with **greater lift, precision, and reliability**.

Q2. What is the PSLV, and why is it considered India's workhorse launch vehicle?

- It is **ISRO's indigenously built, third-generation, expendable (single-use rocket) launch system** designed mainly to place **remote-sensing and Earth-observation satellites into Sun-Synchronous Polar Orbits (SSO)** and also to **launch payloads into LEO (Low Earth Orbit), Sub-GTO and GTO (Geostationary Transfer Orbit)**.
- It is called India's "**workhorse**" because since its first success in **October 1994**, it has carried out **more than 50 successful missions by 2025**, launching **IRS, Cartosat, Oceansat, NavIC, Astrosat, Chandrayaan-1, Mars Orbiter, and hundreds of foreign satellites**.
- Key Features:** High reliability, precision orbit insertion, multi-satellite capability & low cost.

Key Terms:

- Sun-Synchronous Orbit (SSO):** A near-polar orbit where a satellite passes the same place at the same local solar time every day, ensuring consistent sunlight for Earth observation.
- GTO (Geostationary Transfer Orbit):** A highly elliptical orbit used as an intermediate step to reach geostationary orbit.
- Sub-GTO:** A lower-energy transfer orbit similar to GTO but with reduced **apogee** (the farthest point from Earth), used when payloads or rockets cannot reach full GTO.

Q3. Explain the design & working of PSLV (Four-stage architecture - solid & liquid propulsion).

It has a **four-stage design** with **alternating solid and liquid engines**, giving both **power and control**, and each stage is **dropped** once its **fuel is used** to cut weight.

- First Stage (PS1):** It uses a large solid rocket motor (S139) with solid strap on boosters to provide the required thrust needed to overcome gravity and atmospheric drag. It burns for about 2 minutes and then detaches.
- Second Stage (PS2):** It used Vikas engine with liquid propellants that can be stored at room tem-

perature. Liquid propulsion allows **better control and efficiency**.

- 3. Third Stage (PS3):** It is a **solid motor** that gives **rocket** a **strong push** after it leaves the **thick atmosphere**
- 4. Fourth Stage (PS4):** It uses 2 liquid engines to **precisely insert satellites into their designated orbits** and can be **restarted multiple times**, allowing **batch deployment of many satellites in different orbits**.

After satellite deployment, PS4 can be used as **POEM (PSLV Orbital Experimental Module)**, a small platform with solar panels and a lithium-ion battery that runs experiments in space.

Q4. What are the 5 different variants of PSLV (PSLV-G, PSLV-CA, PSLV-XL, PSLV-QL, PSLV-DL)?

- 1. PSLV-G (Standard):** 6 strap-on boosters, 4 stages; first successful flight in 1994.
- 2. PSLV-XL (Extended):** 6 larger strap-ons with extra propellant; payload ~1750 kg; used for Chandrayaan-1, Mars Orbiter, Aditya-L1.
- 3. PSLV-CA (Core Alone):** No strap-ons; lightest version; payload ~1019 kg; used for TeLEOS-2 and DS-SAR satellites.
- 4. PSLV-QL (Quick Launch):** 4 strap-ons, 48 tonnes propellant; payload ~1523 kg.
- 5. PSLV-DL (Dual Launch):** 2 strap-ons, 12 tonnes propellant; designed for dual satellite launches (e.g., XPoSat).

Q5. Discuss the major achievements of PSLV (Chandrayaan-1, Mars Orbiter Mission, etc).

- 1. Chandrayaan-1 (2008)** was launched by **PSLV-XL**, which led to the **discovery of water molecules on the Moon**.
- 2. Mars Orbiter Mission (2013)** was launched by PSLV, making India the **first country to reach Mars in its first attempt**.
- 3. PSLV-C37 (2017)** set a **world record by placing 104 satellites into orbit in one mission**, including **88 foreign satellites**.
- PSLV also launched **AstroSat**, India's **first space observatory**, and a long series of **IRS, Cartosat, Oceansat and NavIC satellites**.
- PSLV has launched **hundreds of foreign satellites** for governments and private companies, making it a major revenue earner for ISRO and strengthening India's position in the global launch market.

Q6. How is PSLV different from GSLV (Geosynchronous Satellite Launch Vehicle)?

| Aspect | PSLV | GSLV |
|--------------------------------|---|--|
| 1. Generation | Third-generation launch vehicle | Fourth-generation launch vehicle |
| 2. Stages | Four stages (PS1, PS2, PS3, PS4) | Three stages (GS1, GS2, Cryogenic Upper Stage) |
| Type of fuel | Mix of solid and liquid propellants | Uses cryogenic fuel (liquid oxygen and liquid hydrogen) |
| 3. Main purpose | Designed mainly for Earth- observation, navigation and scientific satellites | Designed mainly for communication satellites |
| 4. Primary orbit served | LEO, Sun-Synchronous Orbit (SSO), Sub-GTO and GTO | Geostationary Transfer Orbit (GTO) |
| 5. Payload capacity | Up to 1,750 kg to SSPO (600 km) | About 2,250 kg to GTO |

Q7. What is the significance of PSLV-C62 failure (January 2026)?

- 1. PSLV-C62**, launched in **January 2026**, carried **16 satellites**, including **EOS-N1**, a **strategic Earth-observation satellite built by DRDO**, and several foreign satellites.
- It also carried **AayulSAT**, **India's first on-orbit satellite** refuelling demonstrator, intended to test propellant-transfer technologies and **MIRA telescope**, India's lightest space telescope.
- It was the **first launch of 2026**, meant to **re-affirm PSLV's reliability** after the failure of **PSLV-C61 (May 2025)**. But the mission became the **second consecutive failure**.
- This was serious because PSLV had been ISRO's **most trusted launcher for more than three decades**.
- It also **raised concerns** about **ISRO's commercial credibility** because **PSLV is the main revenue-earning rocket** through foreign satellite launches.

Q8. What went wrong in the third stage of PSLV (C61 and C62) and how did it affect the success and reliability of the missions?

1. Both PSLV-C61 (2025) and PSLV-C62 (2026) faced problems in the **third stage (PS3)** of the rocket.
2. Data from the rocket showed a **sudden drop in pressure inside the combustion chamber**, which could have been caused by a **manufacturing defect, fuel leakage, casing crack, or nozzle damage**.
3. When pressure drops, the engine produces **less thrust**, so the rocket cannot reach the **high speed needed to stay in orbit**, leading to mission failure.
4. During PSLV-C62, ISRO reported a “**roll rate disturbance**”, which means the rocket **started rotating uncontrollably**.
5. Since **PS3 does not have its own stabilising thrusters**, a **sideways leak of gas** could create a **twisting force** stronger than the stabilising system of the **fourth stage (PS4)**.
6. The **Failure Analysis Committee (FAC) report of PSLV-C61 was not made public**, which created doubts about **transparency, quality control, and the reliability of PSLV for commercial launches**.
7. The failure also **risks national security** (loss of EOS-N1), **hyperspectral imaging capability** (identifying material composition from space), **and in-orbit servicing** (AayulSAT), while repeated PSLV failures **erode global market share, raise insurance costs, block startups** from proving their tech work, and **undermine Space Policy 2023's goal** of capturing 8% of the global space economy.

Q9. What is the future relevance of PSLV in India's space programme, especially with the rise of GSLV, SSLV, and private sector participation?

1. PSLV will remain the **mainstay for Earth-observation, navigation, scientific and commercial missions**.
2. **GSLV will handle heavy communication satellites and human spaceflight**, while **SSLV will serve the small-satellite market**.
3. PSLV will act as the **reliable medium-lift launcher** for **NSIL, Indian startups, and international customers**.
4. **POEM**, which uses the spent **PS4 stage**, adds a new role for PSLV in **low-cost in-orbit scientific experiments**.

3. Remote Sensing

Q1. What is remote sensing and how is it different from direct observation?

1. **Remote sensing**
 - a. Remote sensing means **studying the Earth without touching it**.
 - b. Information is collected using **satellites, aircraft, or drones**.
 - c. These platforms use **special sensors** to observe land, water, forests, crops, and minerals.
2. **Difference from direct observation**
 - a. Direct observation means **going physically to the place** (survey, digging, drilling).
 - b. Remote sensing works **from a distance**.
 - c. It saves **time, cost, and effort**.
 - d. It is useful in **dangerous or inaccessible areas** (floods, forests, borders).
3. **Example:** Instead of digging randomly for water or minerals, satellites first show **where to look**.

Q2. What are the fundamental principles behind remote sensing?

Remote sensing works on **simple steps**:

1. **Electromagnetic Energy Source:** The **Sun** or the **sensor sends energy**.
2. **Energy Interaction:** This energy falls on the Earth.
3. **Spectral Behaviour:** Different objects **reflect or absorb energy differently**.
4. **Detection by Sensors:** A sensor records this **reflected energy**.
5. **Data Interpretation:** Computers convert this into **images and maps**.

The entire process depends on **energy-object interaction**.

Q3. What are spectral signatures and how are they used to identify objects?

1. Every object reflects light **in its own way**.
2. This reflection pattern is called a **spectral signature**.
3. It acts like a **fingerprint** of that object.
4. By reading these signatures, satellites can **identify objects correctly**.
5. **Example:** Healthy plants absorb **red light** and reflect **near-infrared light** whereas water reflects very little infrared light.
6. **Use:** It can be used to assess crop health, water bodies, forest biomass, etc.

Q4. What are the types of remote sensing (active vs passive)?

| Basis | Passive Remote Sensing | Active Remote Sensing |
|-------------------------------|---|---|
| Energy Source | Uses natural energy (mainly sunlight). | The sensor emits its own energy and measures reflection. |
| Example | Optical and infrared sensors. | Synthetic Aperture Radar (SAR). |
| Operational Capability | Cannot work at night or through clouds. | Works day and night. Penetrates clouds, rain, and fog. Ideal for flood and disaster monitoring. |

Q5. What is electromagnetic spectrum and why is it central to remote sensing?

1. EMS is the **complete range** of all types of **light and energy waves** that travel through space.
2. It includes:
 - a. **Radio waves:** Longest waves but least energy, used in radios, TV, and communication.
 - b. **Microwaves:** Shorter than radio waves, used in cooking and radar.
 - c. **Infrared:** Felt as heat, used in remote controls and thermal cameras.
 - d. **Visible light:** The tiny part we can see - red to violet colors.
 - e. **Ultraviolet:** Invisible to us, but causes sunburn and helps sterilize equipment.
 - f. **X-rays:** Used in medical imaging to see inside the body.
 - g. **Gamma rays:** Shortest, most energetic waves, produced in nuclear reactions and cosmic events.
3. Remote sensing uses this EMS to study **different wavelengths** and **gather data** as **different objects** interact **differently** with EMS.

Q6. What is resolution in remote sensing (spatial, spectral, temporal, radiometric)?

1. Resolution means **how clear and detailed the data is**.
2. Types of Resolutions:
 - a. **Spatial resolution:** How small an object can be seen
 - b. **Spectral resolution:** Number of colour bands used
 - c. **Temporal resolution:** How often a place is revisited

d. **Radiometric resolution:** Ability to detect small energy differences

3. Higher resolution means better analysis.

Q7. How is remote sensing data processed?

Remote sensing data is processed through a series of steps:

1. **Data Acquisition:** Sensors on satellites or aircraft capture electromagnetic radiation reflected or emitted from Earth's surface.
2. **Preprocessing:** Raw data is corrected for distortions caused by atmosphere, sensor errors, or geometric issues (e.g., radiometric and geometric corrections).
3. **Image Enhancement:** Techniques like contrast stretching, filtering, or false-color composites are applied to make features more visible.
4. **Classification:** Pixels are grouped into categories (e.g., forest, water, urban) using supervised (guided by known samples) or unsupervised (automatic clustering) classification methods.
5. **Interpretation & Analysis:** Analysts study processed images to extract patterns, measure changes, or identify resources.
6. **Integration with GIS:** Remote sensing data is combined with geographic information systems for mapping and spatial analysis.
7. **Application:** Final outputs are used in agriculture, disaster management, urban planning, climate studies, and defense.

Q8. What are the various applications of remote sensing and how is it integrated into governance?

1. **Various Applications**
 - a. **Agriculture:** Crop health monitoring, drought assessment, irrigation planning.
 - b. **Disaster Management:** Flood mapping, cyclone tracking, landslide risk analysis.
 - c. **Urban Planning:** Monitoring city growth, roads, and building layouts.
 - d. **Climate & SDGs:** Forest carbon estimation, glacier retreat, water resource mapping.
 - e. **Defence:** Border surveillance, terrain analysis, strategic mapping.
2. **Integration into Governance**
 - a. **Smart Cities:** Infrastructure planning, traffic and pollution monitoring.
 - b. **Digital Land Records:** Accurate mapping of property boundaries and land use classification.
 - c. **Natural Resource Management:** Forests, minerals, water bodies tracked for sustainable use.

- d. **Environmental Monitoring:** Air quality, deforestation, biodiversity conservation.

Q9. What are India's major remote sensing satellites?

1. **IRS Series:** India's first operational remote sensing satellites.
2. **Cartosat Series:** High-resolution imaging satellites used for mapping, urban planning, and infrastructure monitoring.
3. **RISAT Series:** Radar Imaging Satellites providing all-weather, day-night surveillance - crucial for disaster management and defense.
4. **Resourcesat:** Focused on agriculture, forestry, and land resource management.
5. **Oceansat:** Dedicated to oceanography, fisheries, and coastal studies.

Q10. What are the limitations of remote sensing?

1. **Cloud Cover & Atmosphere:** Optical sensors cannot see through clouds, haze, or smoke, limiting data reliability.
2. **Resolution Constraints:** Spatial, spectral, and temporal resolution may not always match the detail required for specific studies.
3. **High Cost & Complexity:** Advanced sensors, satellites, and data processing demand significant investment and technical expertise.
4. **Data Interpretation Issues:** Requires trained analysts; misclassification or errors can lead to wrong conclusions.
5. **Ethical & Privacy Concerns:** High-resolution imagery raises questions of surveillance, data ownership, and misuse.
6. **Limited Ground Truthing:** Remote sensing data often needs validation with field surveys for accuracy.

Q11. What is the future of remote sensing with AI, machine learning, and big data analytics?

1. **AI & Machine Learning for Faster Analysis:** Automates classification of land cover, detects patterns, and reduces human error.
2. **Real-Time Disaster Warnings:** Enables rapid flood, cyclone, and earthquake alerts by processing satellite data instantly.
3. **Better Crop & Climate Prediction:** Enhances forecasting of yields, droughts, and climate change impacts using predictive models.
4. **Integration with Drones & Big Data:** Combines satellite imagery with drone surveys and massive datasets for high-resolution, localized insights.

Conclusion

Remote sensing enables us to observe and manage Earth's resources efficiently from a distance, supporting informed decision-making in governance, development, and disaster management. With AI and advanced analytics, its role will become even more critical in achieving sustainable and resilient growth.

4. From Plastics to Biomaterials

Context

1. In recent times, **pollution** from plastics and synthetic clothes has been **rising** at an alarming pace.
2. To tackle this challenge, countries are **searching for cleaner ways** to make everyday consumer products.
3. **Biomaterials** are emerging as a **promising solution**, as they create **less waste**, are eco-friendly, and can **help build a healthier future**.

Q1. What are biomaterials and What are its Three Types?

1. Biomaterials are materials that come from **natural sources** (like plants, algae, or microbes) or are **made using biological processes**.
2. They are designed to **replace or work** alongside **traditional materials** such as plastics or metals.
3. They are increasingly used across sectors such as **packaging, textiles, construction, and health-care**.
4. The big advantage is that they are **more eco-friendly** and can **reduce pollution**.
5. **3 Types of Biomaterials:**
 - a. **Drop-in Biomaterials:** They are **chemically same as petroleum-based materials** and can fit into existing factories and systems without change. **Example: Bio-PET** (plant-based version of PET plastic).
 - b. **Drop-out Biomaterials:** They are **chemically different from petroleum products** and need new processing methods or recycling systems. **Example: PLA (Polylactic Acid)**, a biodegradable plastic made from corn starch.
 - c. **Novel Biomaterials:** They are **completely new materials** with unique properties and can do things traditional materials cannot, like self-healing or interacting with the body. **Examples: bio-active implants, advanced composites.**

Q2. Why does India need Biomaterials?

By using biomaterials, India can move forward to **achieve multiple goals:**

- 1. Environmental Sustainability:** Plastics and fossil-based materials create huge waste and pollution. Biomaterials are eco-friendly and help India meet goals like **reducing single-use plastics and fighting climate change**.
- 2. Industrial Growth:** By making biomaterials at home, India can **cut down on costly imports** of plastics and chemicals, while **building new industries that create jobs and revenue**.
- 3. Support for Farmers:** Agricultural leftovers like crop residues can be turned into biomaterials. This gives **farmers extra income** beyond food markets and reduces waste burning.
- 4. Global Competitiveness:** As the world shifts to low-carbon and circular products, biomaterials help Indian companies **stay competitive** in exports and **meet international standards**.

| | |
|--|---|
| 3. Weak waste-management and composting infrastructure undermines environmental benefits. | Build end-of-life systems: recycling, industrial composting, and clear pathways for biomaterials disposal. |
| 4. Fragmented policy coordination across agriculture, environment, and industry slows adoption. | Establish integrated policy frameworks, clear regulatory definitions, and labelling norms to build confidence. |
| 5. Risk of import dependence if India moves slowly while other countries scale faster. | Accelerate biomanufacturing infrastructure (fermentation, polymerisation), support pilot plants/shared facilities, and incentivise early investments. |

Q3. Where does India Stand Today?

- 1. Growing Market:** India’s biomaterials sector, covering **bioplastics, biopolymers, and bio-derived materials,** is expanding quickly. The bioplastics market alone was valued at about **\$500 million in 2024** and is expected to grow strongly through the decade.
- 2. Major Investments:** Big projects are underway, such as **Balrampur Chini Mills’ planned PLA plant in Uttar Pradesh,** one of the largest biomaterial investments in the country.
- 3. Domestic Innovation:** Startups are driving creativity. **Example: Phool.co** turns temple flower waste into biomaterials, while **Praj Industries** is building a demonstration-level bioplastics plant (like a trial factory to demonstrate feasibility).
- Despite India’s rich agricultural base, some sectors still depend on **foreign technologies** to convert feedstocks into finished products.

Conclusion

Biomaterials offer India a **unique opportunity** to reduce pollution, strengthen industrial growth, support farmers, and remain globally competitive. With coordinated policies, sustainable farming, and strong biomanufacturing infrastructure, biomaterials can become a **key pillar of India’s green and circular economy.**

5. Malaria Elimination in India

Context

- Under the **National Framework for Malaria Elimination (2016-2030),** India has committed to **eliminating malaria nationwide by 2030,** with an **interim target** of interrupting **indigenous transmission by 2027.**
- By the **end of 2025, sustained surveillance and targeted interventions** resulted in 160 districts across 23 States and Union Territories reporting **zero indigenous malaria cases for three consecutive years.**
- While these gains mark a **decisive shift from control to elimination, challenges persist** in urban centres, border regions, and among mobile populations.
- India’s progress** must be viewed within **global benchmarks** set by the **World Health Organization,** which certifies malaria elimination only after **sustained interruption of transmission** backed by **robust surveillance.**

Q4. What are the Challenges and the Way Forward?

| Challenges | Way Forward |
|--|---|
| 1. Feedstock competition with food sources if agricultural residues and crops don’t scale with rising demand. | Boost feedstock productivity (sugarcane, maize, residues) using new technologies and diversify sources to avoid food vs material conflict. |
| 2. Water stress and soil deterioration from aggressive farming practices. | Promote sustainable farming methods and integrate biomaterial production with climate-smart agriculture. |

Q1. What does India’s target of eliminating malaria under the National Framework for Malaria Elimination (2016–2030) signify, and how does the interim goal of zero indigenous cases by 2027 shape policy priorities?

- India’s elimination target signifies a shift **from managing malaria as a public health burden to permanently interrupting local transmission.**
- The **interim goal of zero indigenous cases by**

2027 creates **urgency** and **measurable milestones** for programme implementation.

3. It **prioritises surveillance, early diagnosis, and rapid response** over broad population-level control.
4. States are **incentivised to sustain gains** once transmission drops to very low levels.
5. This **phased approach reduces the risk of complacency and resurgence** before full elimination.

Q2. How does the World Health Organization define malaria elimination, and where does India currently stand in relation to global malaria-free certification standards?

1. The **WHO defines malaria elimination** as the interruption of local transmission of **all human malaria parasites** for at least three consecutive years.
2. Certification also requires a **strong surveillance and response system** capable of preventing re-establishment.
3. As of mid-2025, 47 countries or territories had achieved **WHO malaria-free certification**.
4. India has **not** yet reached **nationwide elimination** but has achieved **elimination-level status** in many districts.
5. The current challenge lies in **scaling district-level success to national certification standards**.

Q3. What evidence highlights India's progress in malaria reduction over the past decade, and why is India's exit from the WHO High Burden to High Impact group significant?

1. Malaria cases in India **declined by nearly 80%** between 2015 and 2023.
2. **Deaths** due to malaria have also **fallen sharply** due to **improved diagnosis and treatment**.
3. Exiting the **WHO High Burden to High Impact group in 2024** reflects **sustained improvements** in high-endemic States.
4. This exit signals that malaria is **no longer a nationwide crisis** but a **localised challenge**.
5. It **strengthens India's credibility** as a **potential malaria elimination success story**.

Q4. What institutional strategies guide India's malaria elimination effort, and how do the National Framework and National Strategic Plan complement each other?

1. The **National Framework for Malaria Elimination** provides long-term vision and **phased targets till 2030**.
2. The **National Strategic Plan for Malaria Elimination (2023–2027)** operationalises this vision through **concrete actions**.
3. **Surveillance** is treated as a **core intervention** rather than a supporting activity.

4. Universal access to diagnosis and treatment is ensured through the **“test, treat, and track” strategy**.
5. Vector control, community engagement, and health system **strengthening work in coordination**.

Q5. Why do migration, urbanisation, and border regions continue to pose major challenges to malaria elimination in India?

1. Migrant workers often move between **endemic and non-endemic areas, increasing reintroduction risk**.
2. **Urbanisation creates breeding sites** through water storage, construction, and poor drainage.
3. Border districts experience **cross-border population movement**, complicating surveillance.
4. Mobile populations may **not complete treatment, enabling transmission**.
5. These factors demand **targeted, location-specific strategies** rather than uniform interventions.

Q6. How do regional and cross-border transmission dynamics, particularly involving Plasmodium vivax, complicate malaria elimination efforts?

1. *Plasmodium vivax* accounts for **nearly two-thirds of malaria cases** in the South-East Asia region.
2. Its **ability to relapse** after months complicates elimination.
3. **Cross-border movement** between India and neighbouring countries **sustains localised transmission**.
4. Elimination therefore **requires regional cooperation and data sharing**.
5. **Sub-national coordination** is essential to **prevent re-establishment** of transmission.

Q7. Why are drug and insecticide resistance emerging as serious threats to malaria elimination, and how is India responding to these risks?

1. **Partial resistance to artemisinin derivatives** threatens treatment effectiveness.
2. **Declining efficacy of partner drugs** increases relapse and transmission risk.
3. **Insecticide resistance** reduces the impact of vector control measures.
4. India is **strengthening resistance monitoring systems** nationwide.
5. **Strict adherence to full treatment regimens** is being enforced to prevent resistance spread.

Q8. What does India's current malaria epidemiological profile reveal about the geographical concentration of risk, and why does this matter for policy focus?

1. In 2023, 34 States and Union Territories recorded an **Annual Parasite Incidence below one**.
2. Only **Tripura** and **Mizoram** remain above this threshold.
3. This shows **malaria risk** is now **geographically concentrated**.
4. Focused **resource allocation** can yield **faster elimination**.
5. **Blanket national strategies** are being replaced by **targeted district-level action**.

Q9. What key actions will determine whether India can achieve zero indigenous malaria by 2027 and sustain elimination through 2030?

1. **Surveillance systems** must detect every suspected case, including in the private sector.
2. Urban malaria control requires **community participation** and **behavioural change**.
3. **Cross-border and inter-state coordination** must be strengthened.
4. **Continuous funding** and **political commitment** are essential to avoid resurgence.
5. **Sustaining elimination** will depend on **vigilance** even after cases reach zero.

Conclusion

India's malaria elimination journey has reached a **decisive phase**, marked by dramatic reductions in disease burden and widespread district-level elimination. However, the final stretch toward **zero indigenous cases** by **2027** will test **surveillance capacity**, **governance coordination**, and **community engagement**. If India successfully consolidates gains in urban, border, and high-risk regions, it can **not only achieve malaria elimination by 2030** but also **set a global example of disease elimination** in a large, diverse, and mobile population.

6. Long Range Anti-Ship Hypersonic Missile

Context

At the 77th Republic Day Parade, the **Defence Research and Development Organisation** unveiled the Long Range Anti-Ship Hypersonic Missile (LR-AShM), signalling India's rapid advances in next-generation hypersonic warfare and maritime strike capabilities.

Q1. Why is the LR-AShM significant for India's defence preparedness?

1. Hypersonic weapons are redefining modern warfare due to **extreme speed**, **manoeuvrability**, and **survivability**.
2. India faces growing maritime and strategic competition in the **Indian Ocean Region (IOR)**.
3. Existing missile defence systems have limited capability against hypersonic threats.

4. LR-AShM strengthens **deterrence**, **sea denial**, and **precision strike** capabilities.
5. Its unveiling reflects India's push towards **self-reliance in advanced strategic weaponry**.

Q2. What is the Long Range Anti-Ship Hypersonic Missile (LR-AShM)?

1. LR-AShM is an **indigenously developed hypersonic glide missile**.
2. It is designed primarily for the **Indian Navy's coastal battery requirements**.
3. Capable of engaging **both static and moving maritime targets**.
4. Operational range is **up to 1,500 km**, with extended variants under development.
5. Supports **multiple payload configurations**, enhancing mission flexibility.

Q3. What is the flight profile of the LR-AShM?

1. The missile follows a **quasi-ballistic trajectory**.
2. Initially ascends like a ballistic missile but flies at **lower altitudes** later.
3. Achieves **initial speeds up to Mach 10** and sustains average speeds of **Mach 5**.
4. Uses **multiple atmospheric skips** to extend range and complicate interception.
5. Mid-course manoeuvring enhances unpredictability and survivability.

Q4. How does LR-AShM achieve low detectability and high survivability?

1. Flies at **extremely high speed and low altitude**, reducing radar detection windows.
2. Continuous manoeuvring prevents accurate tracking by enemy sensors.
3. Significantly shortens reaction time for **ship-based and ground-based air defence systems**.
4. Its hypersonic glide phase makes interception by conventional missile defences extremely difficult.

Q5. What propulsion and guidance technologies does LR-AShM use?

1. **Two-stage solid rocket motor system:**
 - a. **Stage I:** Boosts the missile to hypersonic velocity and then separates.
 - b. **Stage II:** Provides additional acceleration before burnout.
2. After propulsion phases, the missile enters an **unpowered hypersonic glide phase**.
3. During glide, it executes **controlled aerodynamic manoeuvres** before terminal strike.

Q6. Why is high aerodynamic efficiency important in hypersonic missiles?

1. LR-AShM generates **effective lift with minimal drag**.
2. Higher efficiency allows **longer range, higher accuracy, and better energy utilisation**.
3. Reduces thermal and structural stress during sustained hypersonic flight.
4. Enhances reliability and operational effectiveness with existing energy budgets.

Q7. What is the strategic and operational significance of LR-AShM?

1. At hypersonic speed, the missile can cover **1,500 km in about 15 minutes**.
2. Severely constrains adversary **decision-making and response time**.
3. Extended-range versions of up to **3,500 km** are under development.
4. Positions India among a **small group of nations with operational hypersonic weapons capability**.

Q8. How does LR-AShM strengthen India's sea denial capability?

1. Capable of neutralising **all classes of warships**, including high-value targets.
2. Ideal for **anti-access/area denial (A2/AD)** operations.
3. Enhances control over critical sea lanes in the **Indian Ocean Region**.
4. Restricts an adversary's **military and commercial maritime movement** during conflict.

Q9. What is the multi-service and multi-platform potential of LR-AShM?

1. Currently configured for **naval coastal batteries**.
2. **Army and Air Force variants** are under consideration.
3. Possibility of **ship-launched and air-launched versions**.
4. Cross-platform adaptability maximises return on investment and operational flexibility.

Q10. How does LR-AShM leverage India's existing missile technologies?

1. Incorporates technologies from the **K-15 (Sagarika)** missile family.
2. Draws propulsion, guidance, and systems expertise from **BrahMos** development.
3. Represents **technological convergence**, reducing development risks and timelines.
4. Demonstrates maturity of India's indigenous missile ecosystem.

Q11. What are India's parallel hypersonic missile development paths?

1. Hypersonic Glide Vehicles (HGVs):

- a. Rocket-launched to high altitude, then glide and manoeuvre at speeds above Mach 5.
- b. LR-AShM represents this development track.

2. Hypersonic Cruise Missiles:

- a. Fly within the atmosphere at hypersonic speeds.
- b. Use **scramjet engines** for sustained powered flight.
- c. Offer longer endurance and continuous manoeuvrability.

Q12. What is the difference between ramjets and scramjets?

1. Ramjets:

- a. Compress air using forward motion.
- b. Operate best around Mach 3.
- c. Lose efficiency at hypersonic speeds.

2. Scramjets:

- a. Maintain **supersonic airflow** in the combustion chamber.
- b. Efficient beyond Mach 5.
- c. Technologically complex due to extreme temperatures and pressures.

Q13. What recent breakthroughs has India achieved in scramjet technology?

1. Successful **ground testing of an Actively Cooled Full-Scale Scramjet Combustor**.
2. Achieved a **continuous run time of over 12 minutes**, a major milestone.
3. Built upon a **subscale test exceeding 1,000 seconds** conducted earlier.
4. Followed earlier demonstration via **Hypersonic Technology Demonstration Vehicle (HSTDV)** flight test in 2020.
5. These advances lay the foundation for **operational hypersonic cruise missiles**.

Conclusion

The LR-AShM represents a decisive leap in India's hypersonic warfare capabilities, significantly strengthening sea denial and strategic deterrence. Combined with advances in scramjet technology, it marks India's transition into an elite group of hypersonic-capable nations, with far-reaching implications for regional security and maritime balance.



GEOGRAPHY AND ENVIRONMENT

1. Environmental (Protection) Fund

Context

The Union government has notified comprehensive rules governing the utilisation of the **Environmental (Protection) Fund**, a statutory fund created to channel penalties imposed under key environmental laws into **environmental restoration, pollution control, and sustainability-related activities**.

The legal foundation of the fund lies in the **Jan Vishwas Act, 2023**, which decriminalised several minor environmental offences while retaining monetary penalties to ensure compliance.

The newly notified rules address long-standing concerns about the **opaque and ineffective use of environmental penalties**, marking a shift from punitive enforcement to **corrective and restorative environmental governance**.

Q1. What is the Environmental (Protection) Fund, and why has the government notified detailed rules for its utilisation?

1. The Environmental (Protection) Fund is a **statutory fund of the Government of India** created to utilise penalties imposed for violations of environmental laws.
2. It is provided for under the **Environment (Protection) Act, 1986** and operationalised through rules notified in **January 2026**.
3. The fund draws resources from penalties levied under major laws relating to **air pollution, water pollution, and environmental protection**.
4. The notification of detailed rules ensures that penalties are **systematically credited, transparently administered, and purposefully utilised**, rather than remaining idle or being treated as general revenue.

Q2. How does the Environmental (Protection) Fund align with the 'polluter pays principle' in environmental governance?

1. The **polluter pays principle** holds that those who cause environmental damage must bear the cost of preventing and remedying it.
2. The Fund operationalises this principle by:
 - a. Converting penalties into resources for remediation
 - b. Linking violations directly to environmental restoration

c. Ensuring corrective action rather than symbolic punishment

3. Instead of penalties disappearing into consolidated revenues, they are **recycled into environmental improvement**.
4. This strengthens deterrence while ensuring **tangible environmental outcomes**.

Q3. What are the key objectives of the Environmental (Protection) Fund under the newly notified rules?

1. The primary objective is to **translate regulatory penalties into measurable environmental benefits**.
2. **Key objectives include:**
 - a. Strengthening pollution prevention, control, and mitigation
 - b. Supporting remediation of contaminated sites
 - c. Promoting clean and green technologies
 - d. Enhancing capacity of regulatory institutions
3. The Fund thus shifts environmental enforcement from **punitive compliance to restorative governance**.
4. It aligns environmental regulation with India's **sustainable development goals**.

Q4. What are the permitted areas of utilisation of the Environmental (Protection) Fund, and why are they significant?

1. The rules specify **11 broad categories** of permitted use.
2. **Major areas include:**
 - a. Prevention and control of air, water, and soil pollution
 - b. Restoration of contaminated and degraded sites
 - c. Environmental monitoring equipment and laboratories
 - d. Clean technology research and innovation
 - e. IT-enabled monitoring and compliance systems
 - f. Capacity building of regulatory bodies
3. These restrictions ensure that funds are **not diverted to unrelated purposes**.

- Utilisation is directly linked to **improving environmental quality and enforcement effectiveness.**

Q5. How is the Environmental (Protection) Fund administered, and what institutional mechanisms support its management?

- The Fund is administered by the **Ministry of Environment, Forest and Climate Change (MoEFCC)** or any body notified by the Central Government.
- Institutional framework includes:**
 - Project Management Units (PMUs) at Central and State levels
 - Standardised procedures for crediting penalties
 - Centralised digital oversight
- The **Central Pollution Control Board (CPCB)** will develop and maintain an online portal.
- This portal enables **coordination, monitoring, and real-time tracking** of fund utilisation.

Q6. What is the Centre–State fund sharing mechanism under the Environmental (Protection) Fund, and why is it important?

- The rules provide a **transparent revenue-sharing formula.**
- Distribution mechanism:**
 - 75% of penalty proceeds → Consolidated Fund of the State/UT
 - 25% retained by the Centre
- This recognises that most environmental violations are **local in nature**, requiring State-level remediation.
- Simultaneously, it allows the Centre to fund **national and cross-cutting environmental initiatives.**

Q7. How do audit and transparency provisions strengthen accountability in the utilisation of the Fund?

- The **Comptroller and Auditor General of India (CAG)** is mandated to audit the Fund.
- Transparency mechanisms include:**
 - Periodic audits
 - Digital tracking through CPCB portal
 - Monitoring of project outcomes
- These safeguards prevent misuse, underutilisation, or diversion of funds.
- They enhance **public trust in environmental governance.**

Q8. How does the Environmental (Protection) Fund complement the decriminalisation approach under the Jan Vishwas Act, 2023?

- The Jan Vishwas Act decriminalised minor environmental offences to reduce regulatory burden.
- The Fund ensures that decriminalisation does **not weaken enforcement.**
- Monetary penalties retain **deterrent value** by funding remediation.
- This balances **ease of compliance with environmental accountability.**

Q9. What is the overall significance of the Environmental (Protection) Fund for environmental governance and sustainable development in India?

- The Fund represents a shift from **revenue-oriented penalties to outcome-oriented governance.**
- It strengthens institutional capacity, supports pollution control, and promotes sustainability.
- It enhances **Centre–State cooperation** in environmental management.
- For India, facing chronic pollution and ecological stress, the Fund is a **critical financial and governance instrument.**

Conclusion

The Environmental (Protection) Fund marks an important evolution in India's environmental governance framework. By systematically linking penalties to restoration, monitoring, and innovation, the government has institutionalised the **polluter pays principle in practice, not just in theory.**

If implemented transparently and effectively, the Fund can bridge long-standing regulatory gaps, strengthen environmental institutions, and support India's transition toward **sustainable and accountable development**—ensuring that environmental violations lead not just to punishment, but to **repair and renewal.**

2. Darwin's Bark Spider

Context

- Scientists from China, Madagascar, Slovenia, and the United States have recently studied bark spiders to understand the conditions under which they produce exceptionally tough silk.
- The research has renewed interest in the Darwin's bark spider due to the extraordinary mechanical properties of its silk, which surpass most natural and synthetic fibres.

Q1. What is Darwin's Bark Spider?

- Darwin's bark spider (*Caerostris darwini*) is a unique species of orb-weaver spider.

2. It belongs to the family Araneidae.
3. The species was discovered in 2001 and formally described in 2009.
4. It is named after Charles Darwin, reflecting the evolutionary significance of its exceptional silk.

Q2. Where is Darwin's Bark Spider found?

1. It inhabits riverine forests and wetlands.
2. Its distribution is limited to the forests of Madagascar.
3. The species prefers environments with open water bodies, which strongly influence its web-building behaviour.

Q3. What are the physical characteristics of the spider?

1. Females are medium-sized, with body lengths of about 0.8–1 inch (2–2.5 cm).
2. Males are much smaller than females, showing strong sexual dimorphism.
3. The spiders are typically dark brown with mottled patterns.
4. Their coloration provides camouflage against tree bark, helping avoid predators.

Q4. Why is the silk of Darwin's Bark Spider unique?

1. The spider produces the toughest biological material ever tested.
2. The silk has a tensile strength of about 1.6 gigapascals.
3. This strength is roughly three times higher than that of iron.
4. It is more than twice as tough as any other known spider silk.
5. The silk combines both high strength and elasticity, making it superior to steel and most human-made fibres.

Q5. What is special about its web-building ability?

1. The spider constructs large orb webs that span rivers and streams.
2. These webs can reach diameters of up to 82 feet (25 metres).
3. Unlike most orb-weaving spiders, it builds webs over open water rather than vegetation.
4. The extreme toughness of the silk allows the web to withstand strong winds, rain, and fast-flowing water.

Q6. What is known about its lifecycle and behaviour?

1. The species has a relatively short lifespan, typical of orb-weaving spiders.
2. Females generally live longer than males.
3. Web-building over water allows access to a high concentration of flying insects.

Q7. What is the ecological significance of the Darwin's Bark Spider?

1. It plays an important role in controlling insect populations in riverine ecosystems.
2. By trapping insects over water bodies, it contributes to maintaining ecological balance.
3. Its unique adaptation highlights evolutionary innovation driven by environmental pressures.

Q8. Why is this spider important from a scientific and applied perspective?

1. The properties of its silk offer insights for developing advanced biomaterials.
2. Potential applications include:
 - a. High-strength fibres
 - b. Medical sutures
 - c. Lightweight protective materials
3. Studying the spider helps scientists understand how environmental conditions influence biological material production.

Conclusion

The Darwin's bark spider represents a remarkable example of evolutionary adaptation. Its extraordinary silk combines strength and toughness unmatched in nature, making it valuable for both ecological study and future technological innovation.

3. Article 6 of the Paris Agreement

Context

1. At COP29, carbon markets under **Article 6 (A6)** of the Paris Agreement were made **fully operational**, marking a major step in strengthening the **delivery and efficiency of climate finance**.
2. According to the Article 6 Implementation Partnership, **89 cooperation arrangements across 58 countries** are already in place under Article 6.2, showing rapid momentum in bilateral and plurilateral carbon market cooperation.
3. Further, the adoption of the **Paris Agreement Crediting Mechanism (Article 6.4)** signalled a formal transition from the earlier Clean Development Mechanism (CDM) to a **more rigorous, transparent, and globally aligned system**.
4. For India, Article 6 offers a powerful pathway to mobilise finance, accelerate decarbonisation, and strengthen climate leadership.

Q1. What is Article 6 of the Paris Agreement, and why has it gained renewed importance after COP29?

1. Article 6 of the Paris Agreement provides a **framework for voluntary international cooperation** in achieving climate targets.
2. It allows countries to cooperate through **carbon markets and non-market approaches** to reduce emissions more efficiently.
3. **Why Article 6 matters now**
 - a. COP29 made Article 6 **fully operational**
 - b. Clear rules removed long-standing uncertainty
 - c. Countries can now trade carbon credits with confidence
4. For India, this renewed clarity transforms Article 6 from a **theoretical provision into a practical climate-finance tool**.

Q2. Why were carbon markets under Article 6 made fully operational at COP29, and what problem do they seek to address?

1. Global climate action faces a **large finance gap**, especially for developing countries.
2. Existing public finance is insufficient to meet mitigation and adaptation needs.
3. **Problems Article 6 addresses**
 - a. Limited flow of private climate finance
 - b. High cost of emissions reduction for some countries
 - c. Fragmented carbon markets
4. By operationalising Article 6, COP29 enabled **cross-border carbon trading**, lowering global mitigation costs while channeling finance to countries where emission reductions are cheaper.

Q3. How do cooperation arrangements under Article 6.2 work, and why are they expanding rapidly across countries?

1. Article 6.2 allows countries to enter **bilateral or plurilateral agreements** to trade mitigation outcomes.
2. **How Article 6.2 works**
 - a. One country finances emission reductions in another
 - b. Credits are transferred with accounting safeguards
 - c. Both countries benefit through cost-effective mitigation
3. **Why momentum is growing**
 - a. 89 arrangements across 58 countries al-

ready

- b. Flexibility in design
 - c. Faster implementation than multilateral mechanisms
4. For India, this creates opportunities for **targeted climate partnerships**.

Q4. Why is the transition from the Clean Development Mechanism to the Article 6.4 Crediting Mechanism considered a major reform?

1. The Clean Development Mechanism (CDM) faced criticism for weak oversight and questionable environmental integrity.
2. **Key improvements under Article 6.4**
 - a. Stronger rules against double counting
 - b. Centralised global supervision
 - c. Alignment with Paris temperature goals
3. **Why this matters**
 - a. Article 6.4 creates a **credible, globally trusted carbon market**, restoring confidence among investors and governments.
 - b. This improves long-term sustainability and fairness of climate finance.

Q5. How does Article 6 improve the delivery, scale, and efficiency of climate finance for developing countries like India?

1. Developing countries face barriers in accessing climate finance due to complexity and risk perception.
2. **How Article 6 helps**
 - a. Mobilises **private capital**, not just public funds
 - b. Rewards verified emission reductions
 - c. Reduces dependence on aid-based finance
3. For India, Article 6 turns climate action into an **investment opportunity**, improving both scale and predictability of finance inflows.

Q6. In what ways can India strategically benefit from Article 6 carbon markets to meet its climate and development goals?

1. India has **large low-cost mitigation potential** across renewable energy, energy efficiency, and nature-based solutions.
2. **Strategic benefits for India**
 - a. Monetising emission reductions
 - b. Financing clean energy and industrial transition

- c. Supporting jobs and green growth
3. Article 6 allows India to align **development priorities with climate action**, without compromising economic growth.

Q7. How does Article 6 strengthen environmental integrity and transparency compared to earlier carbon market mechanisms?

1. Environmental integrity was a major weakness of past carbon markets.
2. **Key safeguards under Article 6**
 - a. Robust accounting rules
 - b. Mandatory avoidance of double counting
 - c. Independent verification
3. These measures ensure that **every traded credit represents a real and additional emission reduction**, strengthening global trust in carbon markets.

Q8. What are the key risks and challenges associated with Article 6 implementation, particularly for developing countries?

1. Despite its promise, Article 6 is complex.
2. **Key challenges**
 - a. Technical capacity for accounting
 - b. Risk of unequal bargaining power
 - c. Need for strong domestic regulation
3. Without safeguards, benefits could be uneven. India must build institutional capacity to ensure **fair value and national interest protection**.

Q9. How does Article 6 enhance India's role and influence in global climate governance and South–South cooperation?

1. Article 6 positions India as both a **climate solution provider and market leader**.
2. **Strategic influence**
 - a. Leadership in South–South carbon partnerships
 - b. Shaping global market norms
 - c. Strengthening climate diplomacy
3. By actively engaging, India can move from being a climate finance recipient to a **rule-shaper in global carbon markets**.

Conclusion

Article 6 of the Paris Agreement has emerged as a **powerful climate-finance and cooperation tool**, especially after being fully operationalised at COP29. For India, it offers a unique opportunity to mobilise large-scale finance, accelerate decarbonisation, and integrate climate goals with development priorities. By combining market efficiency

with strong environmental safeguards, Article 6 enables India to pursue climate leadership without sacrificing growth. Its success, however, will depend on smart policy design, institutional readiness, and strategic engagement in global carbon markets.

4. Gadgil Report on Western Ghats

Q1. What is the Gadgil Report and why was it prepared?

1. The Gadgil Report was prepared by the Western Ghats Ecology Expert Panel to assess ecological sensitivity and recommend conservation-oriented development strategies for the **Western Ghats**.
2. **Objectives:**
 - a. Prevent irreversible environmental damage
 - b. Regulate destructive activities
 - c. Promote sustainable livelihoods
3. The report follows **science-led environmental governance**, arguing that long-term economic growth depends on ecological stability, not exploitation.

Q2. Why are the Western Ghats ecologically significant?

1. The Western Ghats are a global biodiversity hotspot and play a vital role in monsoon regulation, river systems, and climate stability.
2. **Ecological importance:**
 - a. High endemic species diversity
 - b. Water security for peninsular India
 - c. Natural disaster regulation
3. Environmental economics recognises such ecosystems as **natural capital**, whose degradation creates long-term economic and social costs.

Q3. What core environmental principles guide the Gadgil Report?

1. The report is guided by three major principles:
 - a. **Precautionary Principle** – prevent damage before it occurs
 - b. **Sustainable Development** – balance ecology and economy
 - c. **Intergenerational Equity** – protect future generations
2. These principles are central to global environmental governance and climate policy, making the report conceptually strong and forward-looking.

Q4. Why did the Gadgil Report face political and social resistance?

1. Resistance arose due to fears that strict regulations would limit mining, infrastructure, and economic growth. States also viewed it as restricting federal autonomy.
2. **Underlying issue:** Short-term development vs long-term sustainability
3. Environmental policies often fail not due to weak science, but due to conflict between ecological goals and political-economic interests.

Q5. How does the Gadgil Report apply the precautionary principle?

1. The report advocates regulating activities **before irreversible damage occurs**, especially in fragile zones.
2. **Key idea:** Environmental thresholds, once crossed, cannot be reversed
3. Environmental economics shows prevention is cheaper than disaster response. Recent floods and landslides have validated this preventive logic.

Q6. Why does the Gadgil Report remain relevant despite non-implementation?

1. The report remains relevant because repeated ecological disasters have confirmed its warnings.
2. **Why relevance persists:** Science was accurate and Policy failure was political, not technical.
3. This reflects a gap between **knowledge and governance**, a common issue in climate and environmental policy worldwide.

Q7. How does the report explain the development–environment conflict?

1. The report argues that development ignoring ecological limits leads to disasters, livelihood loss, and economic instability.
2. **Key argument:**
 - a. Environment is not anti-development
 - b. It is a foundation for sustainable growth
3. Sustainable development theory views ecology and economy as complementary, not contradictory.

Q8. What lessons does the Gadgil Report offer for sustainable development policy?

1. **Major lessons:**
 - a. Science must guide policy
 - b. Local communities must participate
 - c. Prevention is better than disaster relief
2. Long-term development requires respecting ecological limits. Ignoring them leads to higher social and economic costs.

Conclusion

The Gadgil Report endures because it offers a **theory-backed, future-oriented vision** of development. Its continued relevance reflects the cost of ignoring ecological science.

5. India and Climate Resilient Agriculture

Context

Climate change is increasingly affecting Indian agriculture through **unpredictable rainfall, rising temperatures, soil degradation, and water stress**. To ensure **food security for a growing population**, India needs a **coherent national roadmap for climate-resilient agriculture**, aligned with biotechnology and digital innovations.

Q1. What is Climate-Resilient Agriculture?

1. **Climate-resilient agriculture (CRA)** refers to **farming systems and technologies that help agriculture adapt to climate change while maintaining or increasing productivity**.
2. It includes:
 - a. Use of **biofertilizers and biopesticides** to reduce dependence on chemical inputs
 - b. **Soil microbiome analysis** to improve soil health and nutrient availability
 - c. Development of **genome-edited crops** that can tolerate drought, heat, salinity, and pests
 - d. Use of **AI-based tools** that combine weather, soil, and crop data to give **location-specific farming advice**
3. The aim is to **produce more food sustainably, with lower environmental damage and greater resilience to climate shocks**.

Q2. Why Does India Need Climate-Resilient Agriculture?

1. India's agriculture is **highly vulnerable to climate change** due to its structural features.
2. India has a **rapidly growing population**, which increases demand for food.
3. About **51% of India's net sown area is rainfed**, meaning it depends entirely on rainfall.
4. This rainfed land contributes **nearly 40% of India's total food production**.
5. Climate change has increased **rainfall variability, heat stress, and extreme weather events**, making conventional farming risky.
6. Traditional farming methods alone are **no longer sufficient**.
7. CRA provides tools that can **stabilise yields**, pro-

tect soil and water, and reduce climate-related losses.

Q3. Where Does India Stand Today? (Existing Initiatives)

1. ICAR’s Climate-Resilient Agriculture Programme

- a. In 2011, **Indian Council of Agricultural Research (ICAR)** launched the **National Innovations in Climate Resilient Agriculture (NICRA)** project.
- b. Under this project, climate-resilient technologies were demonstrated in **448 villages**.
- c. **Practices included:**
 - i. System of Rice Intensification
 - ii. Aerobic rice cultivation
 - iii. Direct seeding of rice
 - iv. Zero-tillage wheat sowing
 - v. Use of climate-tolerant crop varieties
 - vi. In-situ management of crop residues

2. National Mission for Sustainable Agriculture (NMSA):

The NMSA focuses on:

- a. Improving productivity in **rainfed areas**
- b. Promoting **integrated farming systems**
- c. Enhancing **water-use efficiency**
- d. Improving **soil health management**
- e. Encouraging **resource conservation**

3. BioE3 Policy and Emerging Technologies:

The **BioE3 Policy** identifies climate-resilient agriculture as a **key biotechnology priority**.

- a. Several CRA-related technologies are already commercialised.
- b. Companies supply **bio-inputs** that improve soil health.
- c. India has a growing **agritech ecosystem**, offering:
 - i. AI-based crop advisories
 - ii. Precision irrigation tools
 - iii. Crop health monitoring
 - iv. Yield prediction systems

Implications

- 1. CRA can **stabilize food production** despite climate uncertainty.
- 2. It can **reduce environmental damage** from excessive chemical use.
- 3. Farmers’ incomes can become **more secure and**

predictable.

- 4. India’s **long-term food security** and rural livelihoods will be strengthened.

Challenges and Way Forward

| Challenges | Way Forward |
|--|---|
| Low adoption of climate-resilient practices among small and marginal farmers due to limited awareness, affordability, and access | The government should expand farmer awareness programmes , provide targeted subsidies , improve access to credit and extension services , and ensure that CRA technologies are affordable for small landholders. |
| Quality inconsistencies in biofertilizers and biopesticides, which reduce farmer trust in biological alternatives | India must strengthen quality standards, certification mechanisms, and supply chains for biofertilizers and biopesticides to ensure reliability and build farmer confidence. |
| Slow rollout and limited availability of climate-resilient and genome-edited seeds | The government should accelerate research, approval, and large-scale deployment of climate-tolerant and genome-edited crop varieties through public-private partnerships. |
| Uneven State-wise distribution of new technologies and climate-resilient practices | A coordinated national rollout strategy should be adopted to ensure equitable access across States, with special support for climate-vulnerable and lagging regions. |
| Digital divide limiting farmers’ access to AI-based advisories, precision agriculture tools, and climate information | The government should expand rural digital connectivity , provide farmer training , and ensure wide access to digital tools and real-time climate advisories , especially for small and marginal farmers. |
| Ongoing soil degradation and increasing water scarcity reducing long-term farm productivity | Promote soil health management, water-use efficiency, integrated farming systems , and sustainable resource conservation practices under climate-resilient agriculture programmes. |
| Rising climate volatility that may outpace current adaptation efforts | Introduce financial incentives, climate insurance, risk-sharing mechanisms, and affordable institutional credit to help farmers manage climate-related risks during the transition. |

Fragmented policy co-ordination across ministries and agricultural programmes

Develop a **coherent national CRA roadmap** under the **BioE3 framework**, aligning biotechnology, climate adaptation, digital agriculture, and farm policies for large-scale impact.

Conclusion

Climate-resilient agriculture is no longer optional for India. A **nationally coordinated, technology-enabled CRA strategy**, centred on farmers, is essential to secure food systems in a warming and uncertain climate.

6. Need for Circular Waste Management in India

Context

1. Since 2014, India has focused on waste management as it launched the **Swachh Bharat Mission** ('Clean India Mission') to end open defecation and make cities clean and garbage free.
2. In 2021, at COP26 held at Glasgow, India gave the idea of **circular waste management** through **mission LiFE (Lifestyle for Environment)**.
3. At the COP30 held in Belém, Brazil (November 2025), waste was formally recognised as a **climate issue**, not just a municipal problem.
4. A new initiative, **No Organic Waste (NOW)**, was launched to cut methane emissions, and **circularity** was highlighted as a pathway to inclusive growth, cleaner air, and healthier populations.
5. This makes **urban waste and sanitation management a climate, health, and governance issue**, not merely an aesthetic concern.

Q1. What is Circular Waste Management?

1. It is a model where waste is treated as a resource, not as garbage.
2. It focuses on **reducing** waste, **reusing** materials, **recycling** products, and **recovering** energy so that resources stay in circulation for as long as possible.
3. It has **twin objectives**:
 - a. **Minimize waste.**
 - b. **Recover energy and resources.**

Q2. Why is there a growing need for circular waste management in Urban India?

1. **Urbanisation** in India is **irreversible**. The real choice is between **well-managed cities** and **waste-ridden cities**.
2. Indian cities **lag behind global standards** in providing **clean and healthy environments**.

3. NCR and several Indian cities rank among the **world's most polluted**.
4. **Citizen grievances** are rising despite **regulatory and judicial interventions**.
5. By **2030**, Indian cities will generate **165 million tonnes of waste** annually, emitting **41 million tonnes of greenhouse gases**.
6. By **2050**, with **814 million urban residents**, waste could rise to **436 million tonnes**, leading to dangerous levels of emissions which will adversely affect **people's health, economy and overall climate**.
7. The goal of **Garbage Free Cities (GFC) by 2026** is not just about aesthetics - it is a **survival necessity**.
8. Under **Swachh Bharat Mission Urban 2.0**, **1,100 cities** have been rated free of dumpsites, but complete garbage freedom requires adopting the circular economy model in **all 5,000 cities and towns**.
9. So, India needs to move away from a **linear model** (use → throw → landfill) to a **circular model** (reduce → reuse → recycle → recover energy) for **sustainable waste management**.

Q3. What is the Composition of Urban Waste in India?

To design effective circular waste management systems, it is first necessary to understand **what urban waste consists of**.

1. Organic wet waste:

- a. More than **50% of municipal waste is organic** (consisting of kitchen waste, food scraps, and garden waste).
- b. This category of waste is the **easiest to manage** under a circular model.
- c. It can be:
 - i. **Composted at household or community level**
 - ii. Processed in **large-scale bio-methanation plants**
- d. Such **treatment**:
 - i. Produces **compost** for **agriculture and horticulture**
 - ii. **Generates biogas or compressed biogas (CBG)** as a **green fuel**
 - iii. **Reduces methane emissions** from landfills
- e. Thus, effective management of wet waste directly contributes to **climate mitigation and resource recovery**.

2. Dry Waste and Plastics:

- a. Around **one-third of urban waste** is dry waste, which includes paper, plastic, metal, glass, and textiles.
- b. Among these, **plastic waste poses the greatest challenge** due to its non-biodegradable nature and harmful impacts on ecosystems and human health.
- c. Effective management of dry waste depends heavily on:
 - i. **Segregation at source** by households
 - ii. Efficient **material recovery facilities (MRFs)**
 - iii. Strong recycling markets
- d. While some dry waste can be recycled, not all plastics are recyclable.
- e. Refuse-Derived Fuel (RDF), made from non-recyclable dry waste, is increasingly used by cement and other industries as an alternative fuel.
- f. However, this sector still faces challenges related to:
 - i. Market linkages
 - ii. Quality standards
 - iii. Financial viability

3. Construction and Demolition (C&D) Waste:

- a. India generates nearly **12 million tonnes of C&D waste annually**, driven by rapid and often unplanned urban construction.
- b. It is a major contributor to **urban pollution**.
- c. Common issues include:
 - i. Illegal dumping on roadsides and vacant land
 - ii. Mixing of C&D waste with household waste
 - iii. Dust pollution and environmental degradation
- d. Much of this waste can be **recycled into cost-effective construction material**, reducing pressure on natural resources.
- e. However, recycling capacity has not kept pace with the volume of waste generated.
- f. To address this, India notified:
 - i. **Construction and Demolition Waste Management Rules, 2016**
 - ii. **Environment (Construction and Demolition) Waste Management Rules, 2025**, effective from April 1, 2026

- g. These rules seek to:
 - i. Fix responsibility on large waste generators
 - ii. Levy charges on bulk waste producers
 - iii. Improve accountability and compliance

4. Wastewater and Faecal Sludge:

- a. Water and sanitation are **State subjects**, and States play a crucial role in **recycling and reusing wastewater** in agriculture, horticulture and industrial purposes.
- b. Urban missions such as **AMRUT** and the **Swachh Bharat Mission** emphasise:
 - i. Used water management
 - ii. Faecal sludge and septage management
- c. With India's limited freshwater availability, **recycling and reuse are the only sustainable options** to meet rising urban water demand.

Q4. What has India achieved so far under the Swachh Bharat Mission?

1. Since 2014, **Swachh Bharat Mission** has shifted India from a focus on toilet construction to sanitation sustainability.
2. Universal toilet access exposed the **next critical challenge**: management of faecal waste generated by toilets.
3. This led to the launch of **Swachh Bharat Mission (Grameen) Phase II**, with emphasis on **ODF Plus**.
4. ODF Plus goes beyond infrastructure and focuses on:
 - a. Solid and liquid waste management
 - b. Safe collection, transport, and treatment of faecal sludge
 - c. Behavioural change and service-chain based sanitation
5. As of **October 2025**, over **5.68 lakh villages (nearly 97%)** have been declared **ODF Plus**, reflecting significant national progress.
6. However, **faecal sludge management (FSM)** remains a major gap, especially in **peri-urban and rural areas**, necessitating innovative institutional models.

Q5. What are some successful models of faecal sludge management that can be scaled up?

1. **Urban-Rural Partnership Model: Satara, Maharashtra**

- a. An **under-utilised urban faecal sludge treatment plant** was linked with nearby villages to manage septic tank waste safely.
- b. **Scheduled desludging** was introduced through gram panchayats, with costs recovered via a modest sanitation tax.
- c. The model optimises **existing urban infrastructure** while extending sanitation services to rural areas.

2. Standalone Rural Cluster Model: Mayani

- a. Villages adopted **scheduled desludging** managed by private operators or self-help groups.
- b. A **cluster-level faecal sludge treatment plant** was planned under SBM-G to serve multiple villages together.
- c. Demonstrates how **rural clusters can pool resources** to create financially and technically viable sanitation systems.

These models show that India has moved beyond toilet construction to **system-based sanitation**, and that **both urban-linked and standalone rural FSM models are scalable**, provided there is coordination between governments, private actors, and communities.

Q6. What are the existing Challenges and Way Forward in Achieving Circular Waste Management?

| Challenges | Way Forward |
|---|--|
| 1. Weak segregation, collection, and processing across the waste value chain | Enforce source segregation, strengthen behaviour change, and expand decentralised processing and material recovery facilities |
| 2. Poor economic viability and market acceptance of recycled products | Set quality standards, ensure assured procurement, and build market linkages to improve demand for recycled materials |
| 3. Gaps in regulatory coverage, monitoring, and accountability (including EPR and C&D waste) | Expand EPR to all dry waste categories, integrate C&D waste with building laws, and use digital tracking and audits |
| 4. Institutional fragmentation and capacity constraints of urban local bodies | Improve inter-departmental coordination, build technical capacity, and strengthen municipal finances through PPPs and user charges |
| 5. Low citizen participation in a consumerist society and knowledge gaps across cities | Provide economic incentives, sustained awareness, and promote peer learning through initiatives like Cities Coalition for Circularity (C-3) |

Conclusion

India’s waste challenge is no longer limited to cleanliness. It is deeply linked to **climate change, public health, urban governance, and resource security**.

By shifting from a linear to a circular waste management model and strengthening sanitation systems through urban–rural partnerships, India can convert waste from a liability into a resource.

7. Religious Structures and Wildlife Sanctuaries

Context

- 1. An apex wildlife advisory body under the **Ministry of Environment, Forest and Climate Change** has prepared **draft guidelines to regulate the diversion of forest land inside wildlife sanctuaries for religious structures**.
- 2. The move follows the controversial case of the **Balaram Ambaji Wildlife Sanctuary in Gujarat**, where forest land diversion for a religious establishment was initially approved and later withdrawn.
- 3. This episode exposed serious governance gaps, legal ambiguities, and ecological risks.
- 4. The draft guidelines aim to bring **uniformity, legal clarity, ecological primacy, and administrative discipline** to such sensitive decisions across India.

Q1. Why has the regulation of religious structures inside wildlife sanctuaries become a significant policy issue, and what broader challenges in conservation governance does it reflect?

- 1. The issue has gained prominence because **protected areas are increasingly facing non-forest pressures**, including religious tourism, pilgrimage infrastructure, and associated commercial activities.
- 2. **Deeper governance concerns**
 - a. Incremental construction often begins informally and later seeks legal regularisation
 - b. Religious sites carry strong emotional and political sensitivities
 - c. Conservation officials face pressure to compromise ecological priorities
- 3. Over time, such pressures can **gradually hollow out protected areas**, transforming sanctuaries into mixed-use landscapes.
- 4. The debate reflects a larger challenge: how to enforce environmental laws in socially sensitive

contexts without appearing hostile to faith or culture.

Q2. What is the legal framework governing wildlife sanctuaries and forest land diversion in India, and how does it prioritise ecological protection over non-forest uses?

1. India's conservation framework is among the **strongest in the developing world**, designed to prioritise ecological protection.
2. **Key legal pillars**
 - a. Wildlife sanctuaries are designated exclusively for habitat protection
 - b. Forest land diversion after 1980 requires central approval
 - c. Non-forest activities are exceptions, not rights
3. **Legal philosophy**
 - a. Indian environmental jurisprudence is guided by the **public trust doctrine**, which holds that forests and wildlife are collective national assets.
 - b. This means ecological protection must prevail over private, commercial, or religious encroachments.

Q3. What is the role of the National Board for Wildlife and its Standing Committee in decision-making related to protected areas?

1. The **National Board for Wildlife** acts as the highest advisory authority on wildlife matters.
2. **Functions of the Standing Committee**
 - a. Scrutinises land diversion proposals
 - b. Evaluates ecological impact and habitat fragmentation
 - c. Advises the central government on approvals
3. Its role is critical because decisions taken here often **set precedents** for future cases across the country.
4. The drafting of guidelines reflects an attempt to institutionalise consistency rather than rely on ad-hoc judgments.

Q4. How did the Balaram Ambaji Wildlife Sanctuary case expose gaps in existing legal and administrative processes?

1. The Balaram Ambaji Wildlife Sanctuary case revealed serious procedural weaknesses.
2. **Gaps highlighted**
 - a. Religious sites not recorded in forest settlement documents
 - b. Absence of standard criteria for decision-making

- c. Risk of normalising post-1980 encroachments
3. The reversal of approval demonstrated that **clear rules were missing**, leaving space for discretion, confusion, and later correction.
4. Such uncertainty undermines both conservation credibility and administrative authority.

Q5. What are the key provisions of the draft guidelines regulating religious structures inside wildlife sanctuaries?

1. The draft guidelines adopt a **restrictive but reasoned approach**.
2. **Core provisions explained**
 - a. All post-1980 constructions treated as encroachments to uphold the law
 - b. Regularisation permitted only in rare, well-justified cases
 - c. Expansion of religious structures largely prohibited
 - d. Centralised decision-making based on ecological assessment
3. This framework reinforces the principle that **faith-based presence cannot automatically translate into land rights** inside sanctuaries.

Q6. How do these guidelines attempt to balance religious freedom, cultural practices, and constitutional rights with environmental protection?

1. India has a long tradition of **sacred landscapes**, where religion and nature coexist.
2. **Balancing logic**
 - a. Acknowledges historical religious presence
 - b. Protects genuinely ancient sites from abrupt disruption
 - c. Prevents new constructions disguised as tradition
3. **Constitutional reasoning**
 - a. Freedom of religion is subject to reasonable restrictions, including environmental protection.
 - b. The guidelines reflect this constitutional balance by **allowing continuity without enabling expansion**.

Q7. What are the ecological and conservation risks associated with permitting religious structures and activities inside sanctuaries?

1. Even small religious structures can trigger **disproportionate ecological harm**.
2. **Major risks**
 - a. Habitat fragmentation due to access roads

- b. Increased human movement and noise
 - c. Waste generation and pollution
 - d. Rising human–wildlife conflict
3. Over time, sanctuaries risk becoming **human-dominated landscapes**, defeating their core purpose of providing undisturbed habitats for wildlife.

Q8. How can the draft guidelines strengthen wildlife conservation and ensure consistency in governance across States?

1. If enforced properly, the guidelines can significantly improve conservation outcomes.
2. **Conservation gains**
 - a. Prevent gradual legalisation of encroachments
 - b. Standardise decision-making across States
 - c. Empower forest officials with clear rules
 - d. Reduce political interference
3. They shift governance from **discretionary approvals to rule-based conservation**, strengthening institutional integrity.

Q9. What challenges may arise in implementing these guidelines, and what measures are necessary to ensure they are not diluted in practice?

1. Implementation will be the real test.
2. **Key challenges**
 - a. Political pressure from local interests
 - b. Social sensitivity surrounding religious sites
 - c. Weak monitoring and enforcement capacity
3. **Safeguards needed**
 - a. Transparent public disclosure of decisions
 - b. Independent ecological assessments
 - c. Strong central oversight
 - d. Periodic review of exceptions granted
4. Without these, exceptions may become the norm, undermining conservation goals.

Conclusion

The draft guidelines regulating religious structures inside wildlife sanctuaries represent a **mature and necessary evolution of India's conservation governance**. They recognise cultural realities while reaffirming that **protected areas exist primarily for wildlife, not for incremental human expansion**. In a country where faith and ecology are deeply intertwined, the challenge lies in ensuring that reverence for tradition does not override the ecological responsibilities owed to future generations. Ultimately, the

success of these guidelines will depend not on their wording, but on the **political will and institutional discipline** with which they are enforced.

8. Solar Energy vs Biofuels

Context

Biofuels were once seen as a green alternative to fossil fuels, but new research shows they use large amounts of land for limited energy and climate benefits. The same land, if used for solar power, could produce far more energy and support electrified transport, calling for a rethink of land use in the clean-energy transition.

Q1. Why has land-use efficiency become a central issue in evaluating renewable energy options?

1. Land is not an unlimited resource. As populations grow and climate pressures intensify, the same land is expected to serve **multiple purposes** - food production, energy generation, biodiversity protection, housing, and carbon sequestration.
2. **Why land efficiency matters**
 - a. Renewable energy expansion needs space
 - b. Agriculture must feed a growing population
 - c. Forests and ecosystems store carbon and protect biodiversity
3. When energy systems use land inefficiently, they create hidden costs by displacing food crops or natural ecosystems.
4. Therefore, **energy per acre** has become a critical measure of sustainability, not just total energy output.

Q2. What does “energy yield per acre” mean, and why is it a better metric?

1. Energy yield per acre refers to the **amount of usable energy produced annually from a fixed unit of land**.
2. **Why this metric is superior?**
 - a. It captures land scarcity
 - b. It reveals opportunity costs
 - c. It allows fair comparison across technologies
3. Total energy production can look impressive even if it requires massive land areas.
4. Energy yield per acre exposes whether a technology uses land **wisely or wastefully**, which is essential for long-term climate and development planning.

Q3. How much land is currently used for biofuels globally, and what does this reveal?

1. According to Cerulogy, around **32 million hectares** of land are used solely for liquid biofuels - an area comparable to **Poland, Italy, or Germany**.

2. What this reveals?

- a. Biofuels occupy a vast share of fertile land
 - b. That land has alternative uses (food, forests, solar)
 - c. Land use carries climate and social costs
3. This scale shows that biofuels are not a marginal activity; they represent a **major land-use choice** with significant opportunity costs.

Q4. How much energy could solar panels produce on biofuel land?

1. If solar panels replaced biofuel crops on these 32 million hectares, they could generate about **32,000 terawatt-hours (TWh) of electricity per year.**
2. **Why this is transformative**
 - a. This is **23 times more energy** than biofuels currently produce
 - b. It matches the **entire world's electricity generation in 2024**
 - c. Even partial conversion would yield enormous benefits
3. This shows that land currently delivering modest energy output could instead become a **foundation of global clean energy supply.**

Q5. Why are biofuels inherently inefficient from a land and energy perspective?

1. Biofuels rely on **photosynthesis**, which is naturally inefficient.
2. **Core inefficiencies**
 - a. Plants convert **less than 1%** of sunlight into biomass
 - b. Large energy losses occur during harvesting and processing
 - c. Crops require water, fertiliser, and land management
3. Even the best crops, like sugarcane, perform poorly compared to engineered energy systems. This makes biofuels **land-intensive and energy-dilute.**

Q6. How do solar panels achieve much higher energy yields per acre?

1. Solar panels bypass biological limits and convert sunlight **directly into electricity.**
2. **Key advantages**
 - a. 15–20% sunlight conversion efficiency
 - b. New designs reaching ~25%
 - c. No need for water, fertiliser, or fuel processing
3. Because panels are purpose-built for energy capture, they deliver **orders of magnitude more energy per acre** than crops.

Q7. How does this comparison reshape thinking**about decarbonising road transport?**

1. Biofuels currently meet only **3–4% of global transport energy demand.**
2. **Solar + EV pathway**
 - a. Electric vehicles convert energy far more efficiently
 - b. Global road transport needs ~7,000 TWh/year
 - c. Just **one-quarter of biofuel land**, if solarised, could power all cars and trucks
3. This shows that **electrification powered by solar** is a far superior land-use strategy for transport decarbonisation.

Q8. What are the climate and food-security implications of large-scale biofuel production?

1. Biofuels are often assumed to be climate-friendly, but reality is complex.
2. **Key concerns**
 - a. Limited carbon savings after life-cycle analysis
 - b. Deforestation and land-use change emissions
 - c. Competition with food crops
 - d. Loss of potential carbon sinks
3. In some cases, biofuels may deliver **net climate harm** compared to alternative land uses like reforestation or solar energy.

Q9. What balanced land-use strategies emerge from this analysis?

1. The argument is **not** to eliminate biofuels entirely.
2. **Smarter land-use approach**
 - a. Prioritise solar where land efficiency is crucial
 - b. Use biofuels selectively (e.g., aviation, shipping)
 - c. Free land for food production and rewilding
 - d. Combine solar with farming (agrivoltatics)
3. Such a strategy maximises climate benefits while reducing pressure on land and food systems.

Conclusion

The comparison between solar panels and biofuels reveals a stark truth: **how we use land matters as much as how much energy we produce.** Solar panels generate vastly more energy per acre, making them far better suited for large-scale decarbonisation. While biofuels have niche roles, relying on them extensively is an inefficient use of scarce land. As climate action accelerates, future energy policy must prioritise **land-efficient, high-impact solutions**—with solar energy playing a central role.



SOCIETY AND CULTURE

1. Vehicle-to-Vehicle (V2V) Communication in India

Context

India records the highest number of road accident deaths globally. To reduce fatalities and improve traffic management, the Government of India plans to introduce Vehicle-to-Vehicle (V2V) communication as part of its Intelligent Transport Systems (ITS) and road safety strategy.

Q1. Why is the Government introducing Vehicle-to-Vehicle (V2V) technology in India?

1. India reported over **1.77 lakh road accident deaths in 2024**, averaging **485 deaths per day**, highlighting a severe public safety crisis.
2. Human error, delayed response, fog, sudden braking, and blind spots contribute significantly to accidents.
3. Traditional road safety measures focus on post-accident response rather than prevention.
4. V2V enables **real-time warning and cooperative driving**, shifting road safety from reactive to preventive governance.
5. The initiative aligns with India's commitment under the **Stockholm Declaration** to reduce road deaths by **50% by 2030**.

Q2. What is Vehicle-to-Vehicle (V2V) Communication Technology?

1. V2V is a **wireless communication system** that allows vehicles to exchange real-time data such as speed, location, direction, and braking status.
2. It is a **sub-set of Vehicle-to-Everything (V2X)** technology under the broader **Intelligent Transport Systems (ITS)** framework.
3. The system is inspired by **aviation safety systems**, where aircraft continuously broadcast position and speed to avoid collisions.
4. V2V does not replace drivers but **assists decision-making through early warnings**.

Q3. How does V2V technology work in practice?

1. **On-Board Unit (OBU):**
 - a. Vehicles are fitted with an OBU costing approximately **₹5,000–₹7,000**.
 - b. OBUs enable wireless data exchange within a **300-metre range**.
2. **Real-Time Information Sharing:**

- a. Vehicles continuously broadcast and receive safety-related information.

3. Functional Benefits:

- a. Alerts about sudden braking by vehicles ahead.
- b. Warnings regarding fog, obstacles, parked vehicles, and accident-prone black spots.
- c. Early collision risk alerts at intersections and highways.

4. Illustration:

- a. If a vehicle suddenly applies brakes, following vehicles receive instant alerts, reducing chances of pile-ups.

Q4. What institutional and policy developments support V2V in India?

1. Spectrum Allocation:

- a. **30 GHz radio frequency spectrum** allocated by the Department of Telecommunications under the National Frequency Allocation Plan.

2. Inter-Ministerial Coordination:

- a. A **Joint Task Force** between the Ministry of Road Transport and Highways (MoRTH) and DoT has been constituted.

3. Standard-Setting Process:

- a. Technical standards are being developed in consultation with **Original Equipment Manufacturers (OEMs)**.

4. Policy Prioritisation:

- a. V2V is identified as a **key road safety initiative** under MoRTH's technology-driven transport reforms.

Q5. What is the proposed rollout strategy for V2V technology?

1. **Phase I:** Mandatory installation in **new vehicles**.
2. **Phase II:** **Retrofitting** of OBUs in older vehicles.
3. **Cost Relief:** Radio spectrum to be provided **free of cost**, reducing compliance burden on manufacturers.
4. **Timeline:** Targeted rollout **within the current year**, after notification of standards.

Q6. What are global experiences with V2V communication systems?

1. **United States:** Global leader in V2V research, trials, and regulatory frameworks.
2. **Europe:** Countries like Germany, France, and the UK integrate V2V into smart city mobility projects.
3. **Japan:** ITS Connect programme delivers real-time traffic and emergency alerts.
4. **China:** Extensive adoption with integration into smart mobility ecosystems.
5. **Emerging Pilots:** UAE, Saudi Arabia, Brazil, Mexico, and India are in pilot or early implementation stages.
6. **Commercial Examples:** Volkswagen Golf 8 and select Cadillac models support V2V features.

Q7. What challenges and concerns are associated with V2V adoption in India?

1. **Technological Limitations:**
 - a. Signal interference or failure across diverse vehicle categories and terrains.
 - b. Risk of miscommunication leading to incorrect alerts.
2. **Data Privacy and Surveillance:**
 - a. Continuous collection of vehicle movement and behavioural data raises privacy concerns.
 - b. Risk of profiling and misuse without robust safeguards.
3. **Cybersecurity Risks:**
 - a. Vulnerability to hacking, spoofing, and system hijacking.
 - b. Potential large-scale safety and national security implications.
4. **Regulatory Gaps:**
 - a. Absence of clear rules on data ownership, liability in case of failure, and accountability.

Q8. What should be the way forward for effective V2V implementation in India?

1. **Comprehensive Standards:** Align V2V norms with global best practices.
2. **Legal Integration:** Synchronise with upcoming data protection and cybersecurity laws.
3. **Cyber Audits:** Conduct periodic security audits of V2V infrastructure.
4. **Inclusive Adoption:** Ensure coverage of commercial, public, and private vehicles.
5. **Capacity Building:** Train enforcement agencies and conduct public awareness campaigns.

Conclusion

Vehicle-to-Vehicle communication marks a decisive shift towards technology-enabled road safety governance in India. While it offers significant potential to reduce accidents and fatalities, its success hinges on robust standards, cybersecurity safeguards, and balanced regulation. If implemented prudently, V2V can anchor India's transition to smart, safe, and sustainable mobility.

2. Protection of Children from Sexual Offences (POCSO) Act

Q1. What is the Protection of Children from Sexual Offences (POCSO) Act, 2012, and why was it enacted as a special law despite having already existing laws like IPC?

1. **POCSO Act, 2012** is a special law enacted to protect children below 18 years from sexual abuse and exploitation.
2. Earlier, child sexual offences were covered under adult-focused IPC provisions, but POCSO created a child-specific law centred on the best interests of the child.
3. Earlier, child abuse was treated as an ordinary sexual offence, but POCSO recognises it as a distinct and serious crime against children.
4. Earlier, only penetrative abuse was recognised, but POCSO also criminalises non-penetrative sexual abuse and exploitation.
5. Earlier laws were largely girl-centric, but POCSO is gender-neutral and protects all children.
6. Earlier offences were not graded, but POCSO classifies crimes by severity and links them to proportionate punishment.
7. **POCSO provides time bound trials for offences against children and treats every person below 18 years as a "child" presuming that he/she cannot give legal consent to sexual activity.** (align with the **UN Convention on the Rights of the Child (UNCRC)**)

Q2. What is the Age of Consent in India and how did it evolve?

1. Under POCSO, the **age of consent** (bright line rules) is **18 years** for all genders.
2. Under **IPC Section 375 (after 2013)** and **BNS Section 63 (2023)**, sex with a woman under 18 is rape even if consensual.
3. The **age of consent** was **10 in 1860, 12 in 1891, then 14, then 16, and was raised to 18 in 2012.**
4. The **Criminal Law Amendment Act, 2013** aligned **IPC with POCSO.**
5. The **age of consent is different from the minimum age of marriage** (18 for females and 21 for

males).

Q3. What are the key provisions of the POCSO Act and how does it ensure child-friendly procedures during reporting, investigation, and trial?

1. Key Provisions of the Act:

- a. The POCSO Act **criminalises all forms of sexual assault** (Penetrative and non-Penetrative), **sexual harassment**, and **pornography** involving children.
- b. **Section 19** makes it **mandatory** for any person to **report suspected or known sexual offences** against a child to the **police or Special Juvenile Police Unit**.
- c. Crimes are seen as **“aggravated”** when committed by a **person in positions of trust** (police, teacher, doctor, family) or **against mentally ill children**.
- d. **Section 23 (Confidentiality)**: To prevent social stigma, it is illegal for the media to publish the child’s name, school or photos.
- e. **Burden of Proof (Section 29 and 30)**: In regular law, one is ‘innocent until proven guilty’. But in POCSO, the principle is reversed and the burden of proof lies on the accused.
- f. **Section 42A (Overriding effect)**: If a case falls under both POCSO & IPC, then POCSO takes priority.
- g. **Strict Timelines**: Investigation must ideally be completed in one month and the trial within one year.
- h. **2019 Amendment: Raised minimum punishment** for penetrative assault (7 to 10 years) and **introduced death penalty** for aggravated crimes.

2. The Act provides for **child-friendly procedures** during **investigation** and **trial** so that children are not traumatised. Some examples:
 - a. Statements recorded at a child’s residence or place of choice and not inside police stations.
 - b. Provisions for medical examination in presence of trusted adults.
 - c. Special Courts are created to ensure speedy and sensitive trials of child abuse cases.
 - d. No aggressive questioning; in-camera trials.

Q4. How have Fast Track Special Courts impacted disposal and conviction rates in

POCSO cases, and what systemic gaps remain?

1. India has established 773 Fast Track Special Courts, out of which 400 deal only with POCSO cases.
 2. These courts were created in 2019 using around ₹1900 crore from the Nirbhaya Fund.
 3. By September 2025, these courts had disposed of ~3.5 lakh cases.
 4. In 2025, they achieved a 109% disposal rate by closing ~87000 cases against ~80000 registered.
 5. These courts handle about 9.51 cases per month compared to 3.26 in regular courts.
 6. However, conviction rates have fallen from 35% in 2019 to 29% in 2023.
 7. Fast track courts record only around 19% conviction, meaning more accused are being acquitted despite faster case disposal.
- #### 8. Systematic Gaps:
- a. Investigations are often hurried and charge sheets remain incomplete.
 - b. Forensic reports are delayed, especially in States like Uttar Pradesh and Maharashtra.
 - c. Children do not receive proper legal and psychological support during long trials.
 - d. Compensation is delayed until final judgments, which harms children’s education and health.
 - e. Marginalised families lose income, take loans, and spend more than the state provides.
 - f. Speed without support weakens justice and increases acquittals.
 - g. Courts sometimes allow marriage between survivor and accused, trapping girls with abusers.

Q5. What role do Special Courts, support persons (Section 39), and para-legal volunteers (PLVs) play in ensuring child protection during trials?

1. Special Courts conduct trials in a child-friendly manner and aim to reduce delays.
2. Support persons under Section 39 help children understand the legal process and stay emotionally supported.
3. The Supreme Court made support persons mandatory in all POCSO cases in 2021.
4. NCPCR issued guidelines in 2024 for their functioning.
5. Many States have still not empanelled support persons, leading to case collapse.

6. Para-Legal Volunteers (PLVs) were ordered by the Supreme Court in December 2025 for every police station.
7. PLVs help families file FIRs, prevent police intimidation, and preserve evidence.
8. Lack of PLVs has led to delayed FIRs and harassment of victims, as seen in Unnao and Lalitpur cases.

Q6. Critically analyze the misuse of the POCSO Act in consensual adolescent relationships, with reference to the Law Commission’s 2023 report and Supreme Court’s 2026 intervention.

POCSO treats all persons under 18 as incapable of giving consent.

1. Some parents misuse the law and file false POCSO cases to stop their children from marrying in another caste or religion.
2. By falsely criminalizing the partner of the child, the state is unknowingly destroying the child’s support system.
3. The Law Commission (2023) found that this harms adolescent development.
4. Enfold studies found that about 25% of POCSO cases involve consensual relationships.
5. Courts are clogged with false cases and its time get wasted.
6. The Supreme Court in 2026 admitted that the Act is being misused against genuine adolescent couples.

Q7. What are the arguments for and against lowering the age of consent?

| Arguments for lowering the age of consent | Arguments against lowering the age of consent |
|---|---|
| <ol style="list-style-type: none"> 1. Recognises adolescent sexuality; autonomy of 16-18 year-olds. 2. NFHS-4: 39% girls had their first sexual experience before 18. 3. Enfold studies: Large share of POCSO cases involve consensual romance. 4. International practice: UK, Canada, EU - age 16 with “Romeo-Juliet” clauses as safeguards. 5. ‘Close-in-age’ exemptions prevent criminalising teenage love. | <ol style="list-style-type: none"> 1. Bright-line rule ensures clear protection. 2. Risk of trafficking, child marriage, coercion disguised as consent. 3. Abuse often by trusted adults; consent meaningless in such contexts. 4. Parliament and Standing Committees repeatedly rejected lowering. 5. It may weaken the child-protection framework. |

Q8. What pragmatic steps can be taken to avoid the misuse of POCSO?

1. Introduce close-in-age exemptions (3–4 year gap for 16-18 age group).
2. Guided judicial discretion in sentencing.
3. Strengthen sex education, counselling, family mediation.
4. Build a supportive ecosystem for adolescents to navigate relationships safely.

3. Victim Dignity as a Constitutional Principle

Q1. What is the Phaltan case and why is it important beyond the crime itself?

1. The Phaltan case is significant not only because of the offence involved, but because it exposed **how victims are treated within the criminal justice process**.
2. The focus shifted from merely identifying guilt to examining whether the victim’s privacy, respect, and emotional well-being were protected.
3. **Why it matters:**
 - a. Highlights institutional insensitivity
 - b. Raises questions about victim treatment during investigation and trial
 - c. Shows that justice is also about *process*, not only outcome
4. Modern justice theory views crime as harm to individuals, not just violation of law.
5. The Phaltan case brings this human dimension into focus.

Q2. Why is “victim’s dignity” emerging as a core principle in criminal justice?

1. Victim dignity is central because criminal justice today is moving beyond punishment toward **human-centred justice**.
2. Dignity ensures that victims are not re-traumatised by the system meant to protect them.
3. **Key elements of dignity:**
 - a. Privacy and confidentiality
 - b. Respectful treatment
 - c. Emotional and psychological safety
4. Linked to **restorative justice**, which focuses on healing and recognition of harm. Without dignity, victims may avoid reporting crimes, weakening justice delivery and public trust.

Q3. How is victim dignity constitutionally protected in India?

1. Victim dignity flows directly from **Article 21**, which guarantees the right to life with dignity.
2. Courts have interpreted this to include privacy, bodily integrity, and emotional well-being.
3. **Constitutional implications:**
 - a. State has a duty to protect victim identity
 - b. Investigation must be sensitive and fair
 - c. Legal processes should not humiliate victims
4. This reflects **substantive due process**, where justice is judged not only by legality but also by fairness and human impact.
5. Thus, dignity is a constitutional obligation, not discretionary sympathy.

Q4. What theoretical shift in criminal justice does the Phaltan case reflect?

1. The Phaltan case reflects a shift from an **offender-centric model** to a **balanced justice framework**.
2. Traditionally, criminal law prioritised accused rights and procedural safeguards.
3. **New approach:**
 - a. Victims recognised as rights-holders
 - b. Justice includes dignity, participation, and protection
 - c. Focus on harm, not only guilt
4. This aligns with **victimology and restorative justice theory**, which argue that ignoring victims weakens justice legitimacy.
5. The case shows India’s gradual transition toward a more inclusive criminal justice philosophy.

Q5. How does victim-centric justice improve governance and rule of law?

1. Victim-centric justice strengthens governance by increasing **trust in institutions** and encouraging reporting of crimes.
2. When victims feel respected, they cooperate with law enforcement, improving justice outcomes.
3. **Governance benefits:**
 - a. Higher public confidence
 - b. Reduced under-reporting of crimes
 - c. Stronger institutional legitimacy
4. Rule of law is effective only when citizens believe the system is fair. Victim dignity ensures justice is not merely procedural, but morally credible, reinforcing democratic governance.

Q6. What is secondary victimisation and why is it a systemic concern?

Secondary victimisation occurs when victims suffer additional harm due to **institutional behaviour**, such as insensitive questioning, public exposure, or prolonged trials.

Why it is serious:

- Discourages crime reporting
- Causes psychological trauma
- Undermines justice delivery

It reflects **institutional failure**, where the system reproduces harm instead of reducing it. From a public administration perspective, it shows poor service delivery and lack of accountability within state institutions.

Q7. What institutional reforms are needed to protect victim dignity in India?

1. Protecting victim dignity requires systemic reforms, not just legal provisions.
2. **Key reforms needed:**
 - a. Trauma-sensitive police training
 - b. Strict privacy enforcement
 - c. Victim support services
 - d. Judicial monitoring of victim rights
3. This reflects a move from **formal justice to substantive justice**, where outcomes are judged by human impact. Institutional reform ensures dignity becomes routine practice, not case-specific exception.

Q8. Why is victim dignity essential for a democratic justice system?

1. Democracy rests on respect for individual worth.
2. A justice system that humiliates victims weakens constitutional values and public trust.
3. **Democratic significance:**

- a. Encourages access to justice
 - b. Upholds constitutional morality
 - c. Reinforces equality before law
4. According to democratic theory, state legitimacy depends on how it treats the most vulnerable.
 5. Victim dignity ensures justice is humane, inclusive, and morally authoritative.

Conclusion

The Phaltan case shows that justice without dignity is incomplete. A victim-centred approach strengthens constitutional values, rule of law, and democratic legitimacy.

4. EPFO 3.0: Recasting India's Social Security Architecture

Context

India's social security system is undergoing a significant transition in response to rising labour mobility, digital governance reforms, and the impending implementation of the Labour Codes. In this backdrop, the Employees' Provident Fund Organisation (EPFO) has initiated **EPFO 3.0**, a new phase of digital and institutional reforms aimed at transforming how retirement and social security benefits are delivered.

Q1. What is EPFO and Why Is It Institutionally Important?

1. The Employees' Provident Fund Organisation is one of India's most critical social security institutions.
2. EPFO is a **statutory body** functioning under the **Ministry of Labour and Employment**, established in **1952** to provide retirement and insurance security to workers in the organised sector.
3. It administers **three major contributory schemes** — the Employees' Provident Fund Scheme (**1952**), Employees' Pension Scheme (**1995**), and Employees' Deposit Linked Insurance Scheme (**1976**).
4. Currently, EPFO services nearly eight crore active members and manages a corpus of approximately ₹28 lakh crore, making it one of the largest pension fund managers in the world.
5. Coverage under EPFO is mandatory for establishments **employing 20 or more workers**, and under the **Social Security Code**, this coverage is set to become broader and more uniform across sectors.

Q2. Why Was EPFO 3.0 Needed?

1. Despite extensive digitisation efforts over the last decade, EPFO's functioning continues to **face systemic challenges**.
2. **First, EPFO's IT systems remain fragmented**

across regions, limiting seamless portability for migrant and inter-State workers.

3. **Second, grievance redressal and claim settlement** often require physical interaction with specific regional offices.
4. **Third, the forthcoming Labour Codes** will significantly expand EPFO's mandate to **cover new categories of workers**, which existing systems are not designed to handle at scale.
5. EPFO 3.0 seeks to address these limitations by **redesigning the institution's digital backbone and governance model**.

Q3. What Are the Core Reforms Proposed Under EPFO 3.0?

1. Centralised Core Banking–Like System

- a. EPFO 3.0 proposes the introduction of a nationwide, centralised system similar to core banking platforms used in the financial sector.
- b. Under this model, member accounts will no longer be tied to specific regional offices.
- c. Workers will be able to access services, submit claims, and resolve grievances at any EPFO office across India.
- d. This reform is particularly significant for migrant workers, who frequently change locations and employers.
- e. By decoupling services from geography, EPFO aims to ensure true portability of social security benefits.

2. Revamped Digital Portal With Multilingual Access

- a. A major pillar of EPFO 3.0 is the development of a new, user-friendly digital portal.
- b. The redesigned platform will offer improved navigation, faster service delivery, and integration with artificial intelligence–based language translation tools using **BHASHINI**, a Government of India initiative.
- c. This will allow members to access EPFO services in vernacular languages, addressing a long-standing digital inclusion gap.
- d. This reform directly aligns with the broader goal of improving ease of living and citizen-centric governance.

3. Preparation for Labour Codes and Expanded Coverage

- a. EPFO 3.0 is also a preparatory step for the implementation of the Social Secu-

- rity Code.
- b. Under the Code, EPFO is expected to play a key role in administering social security funds for unorganised workers, including gig and platform workers.
 - c. A separate social security fund is envisaged for these categories, which will significantly expand EPFO's operational scale, beneficiary base, and administrative responsibilities.
 - d. The reforms therefore aim to future-proof EPFO for universal social security delivery.

Q4. How Does EPFO 3.0 Build on EPFO 2.0 Reforms?

1. EPFO 2.0 focused primarily on simplifying procedures and reducing compliance burdens.
2. Withdrawal norms are being streamlined by **reducing categories from 13 to 3 broad heads** — essential needs, housing needs, and special circumstances.
3. At the same time, the **minimum unemployment period for premature final settlement** has been increased **from two months to twelve months** to discourage early withdrawal of retirement savings.
4. Another major reform is the introduction of **UPI-linked withdrawals** through the BHIM app.
5. Members can now view their total balance, eligible withdrawal amount, and minimum retained balance, with initial withdrawal caps proposed at ₹25,000 per transaction.
6. **Self-Correction of Personal Details**
 - a. EPFO 2.0 has also empowered members to **correct personal details** such as name, date of birth, gender, marital status, and employment dates without prior approval from employers or EPFO authorities.
 - b. **For Universal Account Numbers (UANs)** issued before October 1, 2017, employers can make corrections without EPFO approval.
 - c. These changes have **led to over 32 lakh profile corrections** being completed by December 2025, significantly **reducing delays** in claim processing.

Q5. What Are the Key Challenges in Implementing EPFO 3.0?

1. The **first challenge** lies in **managing the scale expansion** that will accompany the inclusion of unorganised and gig workers. This will require seamless integration with Digital Public Infra-

structure such as UPI and BHASHINI.

2. **Second, centralised systems raise serious concerns** related to data security, cyber resilience, and privacy protection. A phased rollout with strong IT governance mechanisms is therefore essential.
3. **Third, digital literacy gaps** among workers remain **significant**. Without sustained awareness campaigns and capacity building of EPFO staff, the benefits of digital reforms may not fully reach intended beneficiaries.
4. **Finally, transitioning from legacy systems** while coordinating with States for Labour Code implementation poses administrative and federal coordination challenges.

Conclusion

EPFO 3.0 represents a structural transformation of India's social security delivery system. By adopting a centralized digital architecture, multilingual access, and simplified procedures, EPFO is aligning itself with the realities of labour mobility, technological governance, and universal social protection.

5. Healthcare Barriers Faced by Transgender Men

Context

Transgender people make up just 0.04% of India's population, yet face disproportionate healthcare barriers. Despite progressive laws like the **Transgender Persons (Protection of Rights) Act, 2019** and welfare initiatives in States such as Tamil Nadu, ground-level healthcare access remains discriminatory, fragmented, and unsafe. Recent petitions in the Madras High Court and expert testimonies have highlighted these systemic gaps.

Q1. Who are Transgender Men and Gender-Diverse Persons?

1. **Transgender men** are individuals who were assigned female at birth but identify as male.
2. **Gender-diverse / non-binary persons** may not identify strictly as male or female.
3. Many are described as **AFAB (Assigned Female At Birth)** individuals.

Q2. What is Gender-Affirming Healthcare?

1. Gender-affirming care includes:
 - a. Respectful general healthcare
 - b. Hormone Replacement Therapy (HRT) (involves administering **testosterone** to induce masculinisation.)

- c. Mental health support
 - d. Surgical care (where sought)
2. Its aim is to align healthcare with a person’s **gender identity**, not to “correct” it.

Q3. What are the associated barriers and what is the way forward?

| Challenges | Way Forward |
|--|--|
| <p>1. Discrimination and Stigma</p> <p>Some transgender men experience bias, disrespect, or judgment from healthcare providers.</p> <p>Fear of being mistreated can make people avoid or delay medical care, even when it’s needed.</p> | <p>1. Policy and Legal Reforms</p> <p>Develop and enforce policies that protect transgender patients from discrimination.</p> <p>Simplify legal and administrative processes related to identity documents.</p> |
| <p>2. Lack of Provider Knowledge</p> <p>Many doctors and nurses receive little training on transgender health.</p> <p>This can lead to incorrect assumptions, inappropriate questions, or inadequate care.</p> | <p>2. Training and Education of Healthcare Providers</p> <p>Include transgender health topics in medical and nursing curricula.</p> <p>Provide regular sensitivity and competency training for healthcare staff.</p> |
| <p>3. Misgendering and Administrative Issues</p> <p>Being called by the wrong name or pronouns can be distressing.</p> <p>Medical forms and systems often do not reflect gender identity accurately, causing discomfort or errors.</p> | <p>3. Inclusive Healthcare Environments</p> <p>Use correct names and pronouns in medical records and interactions.</p> <p>Design inclusive intake forms and create welcoming clinic spaces.</p> |
| <p>4. Limited Access to Gender-Affirming Care</p> <p>Services such as hormone therapy or gender-affirming surgeries may not be available in all areas.</p> <p>Long wait times and strict requirements can delay care.</p> | <p>4. Improved Access to Gender-Affirming Care</p> <p>Expand availability of hormone therapy and related services, especially in underserved areas.</p> <p>Reduce unnecessary gatekeeping and long waiting periods.</p> |

| | |
|---|--|
| <p>5. Insurance and Financial Barriers</p> <p>Insurance may not cover gender-affirming care or related services.</p> <p>Out-of-pocket costs can be high, making care unaffordable for some people.</p> | <p>5. Insurance and Financial Support</p> <p>Ensure insurance coverage for gender-affirming and preventive healthcare.</p> <p>Provide subsidies or financial assistance for low-income individuals.</p> |
| <p>6. Barriers to Preventive Care</p> <p>Transgender men may avoid screenings (like reproductive or sexual health checkups) due to discomfort or fear of discrimination.</p> <p>Providers may incorrectly assume certain care is unnecessary based on gender identity.</p> | <p>6. Community Engagement and Support</p> <p>Involve transgender men in healthcare planning and decision-making to avoid discomfort.</p> <p>Support community-led organizations and peer support networks.</p> <p>Use data to inform evidence-based, inclusive healthcare practices.</p> |
| <p>7. Mental Health Challenges</p> <p>Experiences of discrimination and lack of support can increase stress and anxiety.</p> <p>Finding mental health professionals who are knowledgeable and respectful can be difficult.</p> | <p>7. Strengthening Mental Health Services</p> <p>Increase access to trained, transgender-affirming mental health professionals.</p> <p>Integrate mental health support into primary healthcare services.</p> |

Conclusion

Ensuring safe and dignified healthcare for transgender men requires moving beyond laws and welfare schemes towards trained medical systems, ethical practices, and inclusive research. Affirmative, evidence-based care is essential to realise the constitutional promise of equality and dignity.



HISTORY

1. Humayun's Tomb Site Museum

Q1. What is the significance of Humayun's Tomb as a UNESCO World Heritage Site (1993)?

Humayun's Tomb, built in 1570, is significant because:

1. It is the **first garden tomb in India**, commissioned by Humayun's wife Bega Begum and completed by **Emperor Akbar**, becoming a **precursor to the Taj Mahal** and later Mughal monuments.
2. The **ASI and Aga Khan Trust for Culture** manage the site, ensuring its preservation and protection.
3. It introduced **Persian Charbagh (four-part garden) planning** into Indian architecture.
4. The monument reflects a **fusion of Persian, Central Asian, and Indian traditions**, marking the evolution of **Indo-Islamic architecture**.
5. It symbolises **Mughal imperial power, order, and ideas of paradise**.
6. Its designation as a **UNESCO World Heritage Site (1993)** highlights its **outstanding universal value** and the need for long-term preservation.
7. It acts as a **historical anchor for Delhi**, linking medieval heritage with modern urban identity.

Q2. What are the architectural features of the Humayun's Tomb Site Museum that link the past with contemporary design.

The **Humayun's Tomb Site Museum** blends heritage with contemporary design through:

1. **Salvaged red sandstone façade**, maintaining material continuity with Mughal architecture.
2. **White marble jaali screen**, inspired by Mughal lattice work, reinterpreted in a modern form.
3. **Subterranean galleries** inspired by **baolis (stepwells)**, creating cool, shaded, skylit spaces.
4. A **terrace plaza patterned like Persian carpets**, linking landscape art with architecture.
5. Minimalist design that **does not compete visually** with the monument.
6. The design emphasizes **harmony** between **built structures** and **gardens**, reflecting **Mughal ideals** while serving **modern public needs**.

Q3. How does the reuse of salvaged red sandstone in the museum façade reflect sustainability and

heritage conservation practices?

The reuse of salvaged red sandstone reflects:

1. **Environmental Sustainability** by reducing construction waste and promoting eco-friendly building practices.
2. **Heritage Authenticity** by integrating the original Mughal materials into the new architecture.
3. **Adaptive reuse**, where heritage remnants are given new life in contemporary structures.
4. **Sustainable traditional craftsmanship**, as artisans work with familiar materials and techniques.
5. **Approach for sustainable conservation** in future heritage projects across India.

Q4. What is the role of gardens in Mughal architecture and how is this principle integrated into the museum design?

1. In Mughal Architecture

- a. Gardens symbolised paradise, cosmic order, and balance.
- b. The Charbagh layout integrated water, symmetry, and architecture.
- c. Gardens served as spaces of reflection and imperial symbolism.

2. In the Museum

- a. It is **surrounded by greenery**, following the **Mughal idea** that buildings should sit inside nature.
- b. **Sunken courtyard** with **fountains and plants** mirrors Mughal garden aesthetics.
- c. **Mature trees and shaded spaces** recreate the Mughal garden experience.
- d. Gardens connect the **tomb** (past), the **museum** (present) and the **city** (today's visitors), becoming a **bridge between history and modern life**.

Q5. What is the relevance of site museums in India today as spaces for reflection, public engagement, and cultural continuity?

1. Site museums **contextualize monuments** by providing **historical narratives** and **architectural reconstructions**.
2. In contemporary India, site museums **bridge heritage** with **modern urban life**, encouraging reflection on the past while inspiring visions for

the future.

3. They create **spaces for public engagement** through galleries, auditoriums, and cultural events.
4. By integrating gardens, plazas, and interactive exhibits, they **foster community participation and tourism**.
5. They **sustain traditional crafts** by employing artisans in construction and exhibition design.

2. Zehanpora and the Rediscovery of Kashmir's Buddhist Past

Context

1. Recent excavations by the Archaeological Survey of India at Zehanpora in central Kashmir have uncovered ancient Buddhist stupas, associated brick structures, and cultural deposits.
2. These findings, widely reported in national newspapers, provide material evidence of Buddhism's deep roots in Kashmir, a region more commonly associated in popular narratives with Shaivism and later Islamic traditions.
3. The discovery compels historians and archaeologists to re-examine Kashmir's place in the religious, intellectual, and cultural history of ancient India.

Q1. Why are the Zehanpora stupa discoveries considered archaeologically and historically significant?

1. The Zehanpora discoveries are significant because they provide physical, stratified archaeological evidence of Buddhist presence in Kashmir, rather than relying only on textual references.
2. **Archaeological importance**
 - a. Discovery of planned stupa structures, not isolated artefacts
 - b. Use of brick and stone indicating permanent religious establishments
 - c. Cultural layers suggesting long-term occupation
3. **Historical importance**
 - a. Confirms Kashmir as an active centre of Buddhism, not a marginal zone
 - b. Helps date Buddhist activity to the early historic period
4. Thus, Zehanpora transforms Kashmir's Buddhist past from an abstract idea into a verifiable historical reality.

Q2. How do stupas function as religious, social, and ideological symbols in Buddhism?

1. Stupas are not merely architectural structures; they are multi-layered symbols in Buddhism.
2. **Religious role**
 - a. Enshrine relics of the Buddha or eminent monks
 - b. Act as focal points for worship, meditation, and ritual
3. **Social role**
 - a. Centres around which monastic and lay communities interacted
 - b. Sites of pilgrimage and collective religious identity
4. **Ideological role**
 - a. Represent the Buddha's enlightenment and presence
 - b. Visually communicate Buddhist cosmology and ethics
5. The presence of stupas at Zehanpora indicates organised Buddhist life, not just philosophical influence.

Q3. In what ways do the Zehanpora findings alter our understanding of Kashmir's early religious landscape?

1. Earlier narratives often emphasised Shaivism as Kashmir's earliest dominant tradition. Zehanpora complicates this view.
2. **Key changes** in understanding
 - a. Buddhism was institutionally established, not secondary
 - b. Multiple religious traditions coexisted over long periods
 - c. Religious dominance shifted gradually, not abruptly
3. This shows Kashmir as a religiously layered space, where belief systems overlapped, interacted, and evolved over centuries.

Q4. How does the Zehanpora site help locate Kashmir within wider Buddhist intellectual and trade networks?

1. Zehanpora strengthens the argument that Kashmir was part of trans-regional Buddhist circuits.
2. **Network connections**
 - a. Proximity to routes linking India with Central Asia
 - b. Monasteries likely hosted scholars,

- translators, and monks
- c. Ideas travelled along with merchants and pilgrims

3. Historically, Kashmir contributed to Buddhist philosophy, Sanskrit scholarship, and textual transmission, especially toward Central and East Asia. Zehanpora provides material backing to this intellectual role.

Q5. To what extent do archaeological findings at Zehanpora corroborate literary and traveller accounts of Buddhism in Kashmir?

1. Textual sources long spoke of Kashmir's Buddhist past, but lacked physical confirmation.
2. **Supporting texts**
 - a. **Kalhana's Rajatarangini** mentions Buddhist monks and sites
 - b. Chinese pilgrims like **Xuanzang** (Hiuen Tsang) described monasteries in Kashmir
 - c. Buddhist councils are traditionally associated with the region
3. Zehanpora's stupas validate these textual narratives, strengthening confidence in combining archaeology with historical literature.

Q6. What do these discoveries reveal about patterns of religious coexistence and state patronage in ancient Kashmir?

1. The findings suggest that ancient Kashmir practised religious pluralism.
2. **Patterns observed**
 - a. Buddhist institutions flourished alongside Shaiva traditions
 - b. Rulers patronised multiple religious groups
 - c. Religious change occurred through patronage shifts, not forced displacement
3. This indicates a **syncretic political culture**, where rulers prioritised stability and learning over exclusivity.

Q7. Why did Buddhism decline in Kashmir despite early royal and popular support?

1. The decline of Buddhism in Kashmir was **gradual and structural**, not violent.
2. **Key reasons**
 - a. Decline in royal patronage over time

- b. Revival and dominance of Shaivism
- c. Absorption of Buddhist ideas into other traditions

3. Importantly, Buddhism's decline did not erase its influence. Many ethical, philosophical, and artistic elements survived within Kashmiri culture.

Q8. How do the Zehanpora stupas contribute to broader debates in Indian historiography on cultural continuity and change?

1. Indian historiography often debates whether cultural change was marked by rupture or continuity.
2. **Zehanpora's contribution**
 - a. Shows continuity through layered religious practices
 - b. Demonstrates cultural adaptation rather than replacement
 - c. Challenges simplistic "rise and fall" narratives
3. Thus, Zehanpora supports a civilisational continuity model, where traditions evolve through interaction.

Q9. What is the contemporary relevance of the Zehanpora discovery for heritage conservation and identity politics?

1. Today, history often shapes identity and politics.
2. Contemporary relevance
 - a. Highlights Kashmir's plural historical identity
 - b. Strengthens case for inclusive heritage conservation
 - c. Encourages academic, not ideological, engagement with history
3. Protecting Zehanpora is essential not just for archaeology, but for promoting shared cultural ownership and dialogue in a sensitive region.

Conclusion

The Zehanpora stupas are not isolated ruins; they are keys to understanding Kashmir's deep Buddhist past. They confirm that Kashmir was once a major centre of Buddhist worship, learning, and cultural exchange. By connecting archaeology with textual history, the discovery enriches Indian historiography and reinforces the idea of India, and Kashmir, as a civilisation shaped by pluralism, continuity, and intellectual exchange. Preserving such sites is vital for both scholarship and social harmony.



LATEST GOVERNMENT SCHEMES

1. Startup India @10 (Completely Explained)

Context

On January 16, 2025 (**National Startup Day**), the Prime Minister **Narendra Modi** addressed India's startup ecosystem on the completion of ten years of the **Startup India** programme, launched in 2016. The address reviewed achievements, highlighted strategic priorities, and outlined the way forward as startups become central to India's growth and innovation strategy.

Q1. What is the Startup India scheme?

1. Startup India is a **flagship initiative** of the Government of India launched on January 16, 2016.
2. Its **objective** is to build a **robust ecosystem** for **innovation** and **entrepreneurship**.
3. The scheme **aims to transform India** from a **job-seeking to a job-creating economy**.
4. It rests on **three core pillars**:
 - a. Simplification and handholding
 - b. Funding support
 - c. Incubation and industry-academia partnership
5. **Key benefits** include tax exemptions, easier compliance, seed funding, and mentorship for eligible startups.

Q2. How has India's startup ecosystem grown over the past decade?

1. India recorded nearly **44,000 startup registrations in 2025**, the highest annual addition so far.
2. The country has become the **third largest startup ecosystem globally**.
3. **Growth trajectory**:
 - a. Around 500 startups and four unicorns in 2014.
 - b. Over two lakh startups recognised by the **Department for Promotion of Industry and Internal Trade** by 2025.
 - c. About 125 active unicorns.
4. This **expansion** has created a **virtuous cycle**:
 - a. Startups → Unicorns → IPOs → Jobs and innovation-led growth.

Q3. What cultural shift has Startup India enabled?

1. **Risk-taking** is now socially accepted and respected.
2. The mindset has shifted **from job security to entrepreneurship**.
3. Entrepreneurship has **expanded beyond traditional business families**.
4. **Participation** from the middle class and economically weaker sections has **increased**.
5. This **cultural change** strengthens India's demographic dividend and innovation capacity.

Q4. How has government funding supported startups?

1. The **Fund of Funds for Startups (FFS)** has invested about ₹25,000 crore.
2. **FFS 2.0**, with ₹10,000 crore, was approved in April 2025.
3. The new fund focuses on **deep-tech sectors** such as:
 - a. Artificial intelligence and machine learning
 - b. Quantum technologies
 - c. Defence and aerospace
4. The emphasis is on **patient capital** due to **long gestation periods** in deep tech.

Q5. What is the strategic focus on indigenous technology and AI?

1. The Prime Minister emphasised the need for **indigenous AI solutions**.
2. **Key priorities** include:
 - a. Indian-developed AI models
 - b. Hosting data on Indian servers to ensure data sovereignty
3. Under the **IndiaAI Mission**:
 - a. Over 38,000 GPUs have been onboarded.
 - b. Access to high-end computing is being democratised.
4. The **broader focus** is on manufacturing global-standard products and technological leadership, not just partnerships.

Q6. How inclusive is the startup ecosystem today?

1. **Women-led startups** have grown significantly.

2. Over 45% of recognised startups have at least one woman director or partner.
3. India is the **second largest ecosystem** globally for women-led startups.
4. **Entrepreneurship** has **expanded** rapidly in:
 - a. Tier-2 and tier-3 cities
 - b. Rural areas
5. Startups are increasingly solving **local and grassroots problems**, promoting **balanced regional development**.

Q7. What regulatory reforms have supported startups?

1. The **Jan Vishwas Act** decriminalised over 180 legal provisions.
2. This promotes:
 - a. Ease of Doing Business
 - b. Trust-based governance
3. Other **reforms** include:
 - a. Self-certification under multiple laws
 - b. Simplified mergers and exit procedures
 - c. Reduction of Inspector Raj
4. **Innovation** has been further supported through **Atal Tinkering Labs**, hackathons, and incubation networks.

Q8. What sectoral breakthroughs have been enabled?

1. **Defence and Space**
 - a. The **iDEX framework** enabled startup participation in defence procurement.
 - b. Around **200 space startups** now operate after opening the sector to private players.
2. **Drones**: Removal of outdated regulations unlocked innovation.
3. **Public Procurement**
 - a. Around 35,000 startups are onboarded on the **Government e-Marketplace (GeM)**.
 - b. They have received over five lakh orders worth more than ₹50,000 crore.

Q9. What challenges remain and what is the way ahead?

1. Sustaining funding during **global economic uncertainty**.
2. **Bridging deep-tech talent gaps** through stronger academia–industry collaboration.
3. **Integrating startups** with national missions in AI, defence, space, and climate technologies.
4. **Ensuring quality scale-up**, especially in domestic manufacturing.
5. Strengthening **cybersecurity** and **data governance**.
6. Preventing regional and sectoral concentration by encouraging **export-oriented startups**.

Conclusion

A decade after its launch, Startup India stands at a turning point - moving from rapid expansion to sustainable scale. Built on digital public infrastructure, demographic strength, and continued reforms, startups are poised to remain central to India's growth as it advances towards **Viksit Bharat 2047**.



PLACES IN NEWS

| Place | Context | Key Highlights |
|-------------------------|--|--|
| 1. Iran | India issued a travel advisory asking its citizens to avoid non-essential travel to Iran due to ongoing domestic protests and security concerns. | <ol style="list-style-type: none"> 1. Capital: Tehran 2. Member of BRICS, SCO and OPEC 3. Land borders: Armenia, Azerbaijan, Turkmenistan (north); Afghanistan, Pakistan (east); Iraq, Turkey (west) 4. Maritime boundaries: Caspian Sea (north); Persian Gulf and Gulf of Oman (south) 5. Lake Urmia: largest salt (endorheic) lake in the Middle East 6. Ranks 2nd globally in natural gas reserves and 4th in proven crude oil reserves |
| 2. Venezuela | The UN Secretary-General expressed concern over the possibility of worsening political and social instability in Venezuela. | <ol style="list-style-type: none"> 1. Capital: Caracas; located in northern South America 2. Borders: Guyana (east), Brazil (south), Colombia (west and southwest) 3. Tri-junction of Brazil–Venezuela–Guyana at Mount Roraima 4. Northern coastline along the Caribbean Sea and Atlantic Ocean 5. Major physiographic regions: Andes Mountains, Maracaibo Lowlands, Guiana Highlands 6. Rivers: Orinoco (drains into Atlantic), Rio Negro; Lake Maracaibo 7. Angel Falls (on Churún River): world's highest waterfall 8. Grasslands: Llanos 9. Possesses the largest oil reserves globally, concentrated in the Orinoco Oil Belt (Faja Petrolífera del Orinoco) |
| 3. Liechtenstein | India's Commerce and Industry Minister visited Liechtenstein to speed up implementation of the India–EFTA Trade and Economic Partnership Agreement (TEPA) . | <ol style="list-style-type: none"> 1. Capital: Vaduz 2. Part of EFTA; TEPA is India's first FTA with a developed country bloc (Iceland, Liechtenstein, Norway, Switzerland) 3. Doubly landlocked (only country in Europe with this feature) 4. Not a member of the European Union 5. Borders: Austria (north & east), Switzerland (west & south) 6. Dominated by the Alps; highest point: Grauspitz 7. Major rivers: Rhine, Samina |
| 4. Chile | A massive wildfire in southern Chile led to the evacuation of over 20,000 people , highlighting climate-linked disaster risks. | <ol style="list-style-type: none"> 1. Capital: Santiago 2. A long, narrow country in South America; maximum width ~110 miles 3. Neighbours: Peru and Bolivia (north), Argentina (east) 4. Western boundary along the Pacific Ocean 5. Physiographic divisions: Andes Mountains (east), Central Valley, Coastal Ranges (west) 6. Atacama Desert: among the driest deserts in the world 7. Longest river: Loa, originating in the Andes 8. Part of the Lithium Triangle (with Argentina and Bolivia) 9. Highest peak: Ojos del Salado |



ETHICS

1. Bridging Inequality Through Mentorship

Context

1. India has over **40 million students in higher education** and **10 million youth entering the workforce annually**, yet many struggle to transition from education to employment.
2. Despite skilling and internship policies, **inequalities in access to confidence, networks, and exposure** persist, especially for first-generation learners and women.
3. Governments and institutions are increasingly recognising **mentoring as a systemic solution**, integrating it into platforms like the National Career Service and State education systems.

Ethical Issues Involved

1. **Inequality of Opportunity**
 - a. Talent is widespread, but **access to guidance, networks, and role models is unequal**.
 - b. First-generation learners lack informal social capital enjoyed by privileged groups.
 - c. John Rawls' theory of **Fair Equality of Opportunity** is violated when background determines life chances.
2. **Gender Justice and Workforce Exclusion**
 - a. Women achieve educational parity but face **low labour force participation** due to social norms, safety concerns, and confidence gaps.
 - b. Denial of mentorship reinforces **structural patriarchy**.
 - c. Aligns with **Amartya Sen's Capability Approach**, where real freedom to choose work is constrained.
3. **Ethical Responsibility of Institutions**
 - a. Education systems focus on degrees but neglect **human development** like confidence, adaptability, and leadership.
 - b. This reflects **instrumental ethics** over **human-centric ethics**.
 - c. Institutions risk moral failure by producing "qualified but unsupported" youth.
4. **Digital and Network Divide**
 - a. Employment increasingly depends on **networks and social connections**, disadvantaging rural and marginalised youth.
 - b. This creates a modern form of exclusion, violating principles of **social justice and inclusivity**.
5. **Intergenerational Ethical Duty**
 - a. Professionals benefiting from society have

a **moral obligation to support the next generation**.

- b. Gandhian ethics of **trusteeship** emphasise sharing privilege for collective upliftment.

Course of Action

1. **Institutionalising Mentorship in Public Systems**
 - a. Embed mentoring into **education, skilling, and employment platforms**.
 - b. Ensure mentoring is treated as **essential infrastructure**, not a voluntary add-on.
 - c. Reflects **Max Weber's ethics of responsibility** in governance.
2. **Ensuring Quality, Safeguards, and Inclusion**
 - a. Develop **ethical standards**, mentor training, safeguarding norms, and accountability mechanisms.
 - b. Prevent power imbalance, bias, or tokenism.
 - c. Aligns with **Kantian ethics** — treating mentees as ends, not means.
3. **Targeted Support for Women and Marginalised Groups**
 - a. Design mentoring sensitive to **gender realities, social norms, and safety concerns**.
 - b. Promote role models who reflect lived realities.
 - c. Example: Women officers like **Kiran Bedi** mentoring young women in leadership and policing.
4. **Multi-Stakeholder Ethical Collaboration**
 - a. Government: policy architecture and scale.
 - b. Non-profits: training, evidence, and ethical design.
 - c. Corporates: volunteering and network access through CSR.
 - d. Example: **LinkedIn Coaches Program** enabling professionals to mentor under-served youth.
5. **Building a Culture of Ethical Citizenship**
 - a. Encourage professionals to mentor at least one young person annually.
 - b. Reinforces **communitarian ethics** and civic virtue.
 - c. Echoes civil servants like **E. Sreedharan**, who mentored teams to build institutions, not just projects.

Conclusion

Mentoring is an ethical imperative for India's demographic moment. By institutionalising guidance, sharing social capital, and nurturing human potential, India can advance justice, dignity, and inclusive growth while fulfilling its moral duty to the next generation.



ESSAY

All ideas having large consequences are always simple.

The **Wright brothers'** first flight at Kitty Hawk lasted merely **12 seconds and covered 120 feet** - a simple act of lifting off the ground that would forever transform human civilization. This modest achievement, born from the elegantly **simple principle that lift could overcome gravity**, unleashed consequences that reshaped warfare, commerce, communication, and our very conception of distance and possibility. The profound truth embedded in this historical moment illuminates a fundamental pattern of human progress: the **most transformative ideas are often deceptively simple** in their core essence.

The assertion that “**all ideas having large consequences are always simple**” invites us to examine the **paradoxical relationship** between **conceptual simplicity** and **transformational impact**. At first glance, this statement appears to contradict our intuitive understanding of complexity - ideas that reshape civilizations must be intricate and sophisticated. Yet, history repeatedly demonstrates that the most revolutionary concepts often emerge from startlingly simple insights that, once grasped, seem almost inevitable in their logic.

This exploration demands we distinguish between the **simplicity of core principles** and the **complexity of their applications**. While **Einstein's $E=mc^2$** represents one of the most elegant equations in physics, its implications spawned nuclear energy, fundamentally altered our understanding of matter and energy, and reshaped geopolitical power structures. The equation's **mathematical simplicity** belies the profound complexity of its consequences, suggesting that transformative ideas possess an inherent clarity that makes them both comprehensible and powerful.

The Elegant Architecture of Revolutionary Thought

The most consequential ideas in human history share a remarkable characteristic: they can be expressed in terms so simple that a child could grasp their essence. **Democracy**, at its core, embodies the straightforward principle that people should govern themselves. This elementary

concept has toppled monarchies, inspired revolutions, and continues to shape political discourse across continents. Similarly, **non-violence** as articulated by **Mahatma Gandhi** rests on the simple premise that moral force can overcome physical force - a principle that liberated nations and inspired civil rights movements worldwide.

The **printing press** revolutionized human knowledge transmission through the simple idea of **movable type** - arranging individual letters to form words, words to form sentences, and sentences to form books. **Johannes Gutenberg's** innovation democratized information, sparked the Renaissance, enabled the Reformation, and laid the foundation for **mass literacy**. The underlying concept required **no complex theoretical framework**, yet its consequences fundamentally altered the trajectory of human civilization.

In the realm of economics, **Adam Smith's invisible hand** represents another instance of profound simplicity generating vast consequences. The notion that individual self-interest, when operating within appropriate institutional frameworks, can promote collective welfare became the philosophical foundation of modern capitalism. This simple insight about human nature and market dynamics has shaped economic policies, influenced political ideologies, and affected the lives of billions across centuries.

The **digital revolution** exemplifies how simple binary logic - the **fundamental principle of ones and zeros** - can transform every aspect of human existence. The concept that all information can be reduced to binary code enabled the development of computers, the internet, artificial intelligence, and the modern information economy. This elementary mathematical principle has created new industries, revolutionized communication, and fundamentally altered how humans work, learn, and interact.

The Paradox of Simplicity and Complexity

However, the relationship between simple ideas and large consequences reveals fascinating paradoxes that merit deeper examination. While the core principles may be simple, **their implementation often requires extraordinary sophistication**. The concept of **universal healthcare** - that medical care should be available to all regardless of economic status - is elegantly simple, yet its

practical realization involves complex policy frameworks, intricate funding mechanisms, and sophisticated administrative systems.

The **internet** emerged from the **simple idea** of **connecting computers to share information**, yet its development required breakthrough innovations in networking protocols, data transmission, and distributed computing. The underlying concept of interconnectedness was straightforward, but translating this vision into reality demanded decades of technical innovation and collaborative effort across multiple disciplines.

Climate change mitigation rests on the simple recognition that human activities affecting atmospheric composition must be modified to prevent catastrophic warming. This fundamental insight, while scientifically straightforward, has generated complex international negotiations, sophisticated technological solutions, and intricate policy frameworks spanning economics, politics, and social behavior.

Critics argue that this perspective oversimplifies the nature of transformative ideas, suggesting that truly revolutionary concepts often emerge from complex theoretical frameworks and sophisticated analytical processes. The development of **quantum mechanics**, for instance, required intricate mathematical formulations and counterintuitive theoretical constructs that challenged fundamental assumptions about reality. Similarly, **genetic engineering** emerged from decades of complex research in molecular biology, biochemistry, and genetics - hardly simple in its conceptual development.

Moreover, some argue that attributing simplicity to consequential ideas represents a form of **retrospective bias** - we perceive ideas as simple only after their implications have been fully understood and integrated into our worldview. The **theory of evolution**, while appearing straightforward in hindsight, required Charles Darwin to synthesize observations from geology, biology, and natural history into a comprehensive framework that challenged prevailing religious and scientific orthodoxies.

The Catalyst Effect: When Simple Meets Profound

Despite these valid concerns, the pattern of simple ideas generating large consequences reflects deeper truths about human cognition and social change. **Simplicity enhances communicability** - ideas that can be easily understood and

transmitted are more likely to gain widespread acceptance and implementation. The **civil rights movement's power** derived partly from the **moral clarity** of its central message: **all humans deserve equal treatment regardless of race**. This simple principle resonated across diverse populations and provided a unifying framework for sustained social action.

The **scientific method** itself exemplifies this principle - the straightforward **process of observation, hypothesis formation, experimentation, and conclusion** has revolutionized human understanding of the natural world. This methodical approach, while simple in concept, has enabled unprecedented technological advancement and improved living standards globally. Its power lies not in complexity but in its systematic simplicity and universal applicability.

Microfinance demonstrates how simple financial concepts can generate profound social consequences. The basic idea that **small loans to poor individuals can enable entrepreneurship and poverty alleviation** has transformed development economics and improved millions of lives. **Muhammad Yunus's insight** that traditional banking overlooked the creditworthiness of the poor led to innovative financial institutions that have reshaped approaches to economic development.

The **cooperative movement** emerged from the simple principle that **individuals can achieve more through collective action than individual effort**. This elementary insight has generated diverse organizational forms - from agricultural cooperatives to credit unions - that have empowered communities, democratized economic participation, and provided alternatives to purely capitalist or socialist economic models.

The Synthesis of Simplicity and Transformation

The relationship between simple ideas and large consequences reveals fundamental aspects of how transformative change occurs in human societies. **Simplicity provides accessibility** - ideas that can be readily understood by diverse populations are more likely to gain traction and generate widespread support. **Clarity enables action** - when people can grasp the essential logic of an idea, they are better positioned to implement it effectively across varied contexts.

The **Universal Declaration of Human Rights** exemplifies this dynamic perfectly. Its core assertion that **all hu-**

mans possess inherent dignity and fundamental rights is conceptually simple, yet this principle has influenced legal systems, inspired social movements, and provided moral frameworks for addressing injustice worldwide. The declaration's power derives from its ability to articulate complex philosophical concepts in accessible language that transcends cultural and linguistic boundaries.

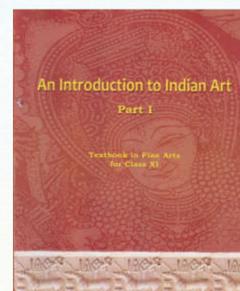
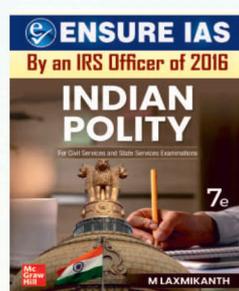
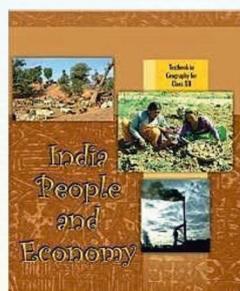
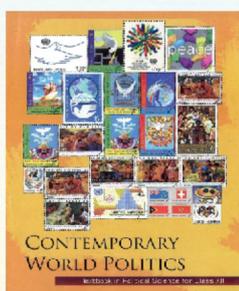
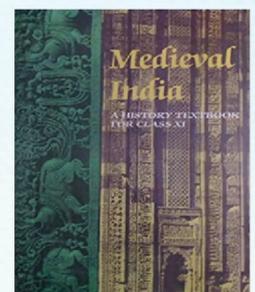
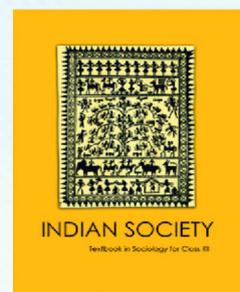
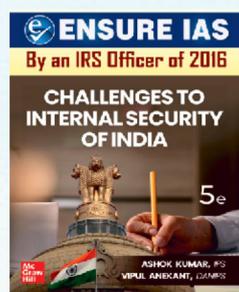
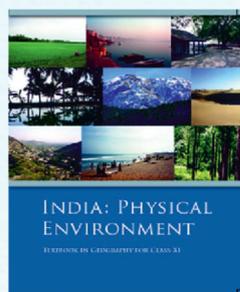
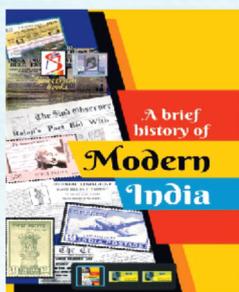
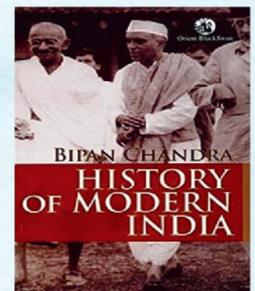
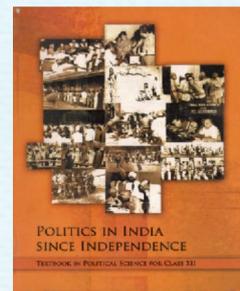
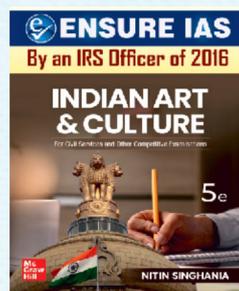
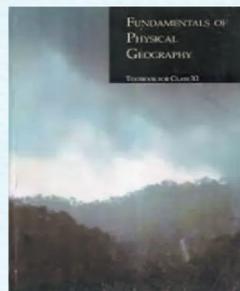
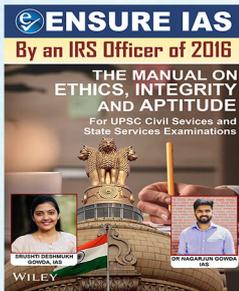
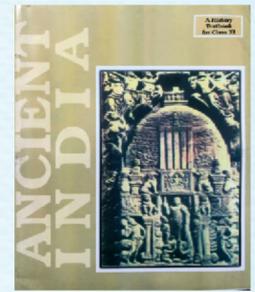
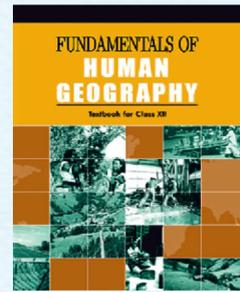
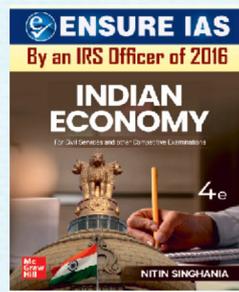
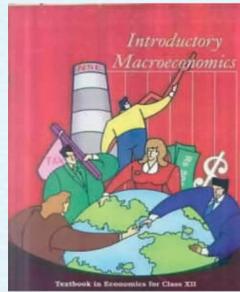
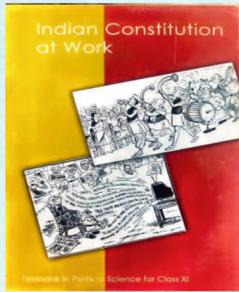
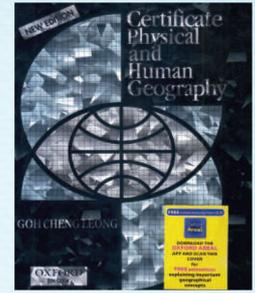
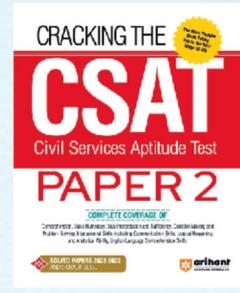
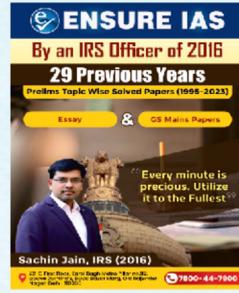
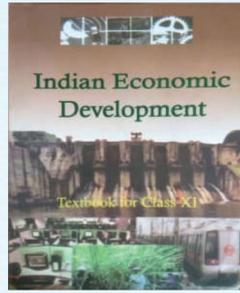
Looking toward the future, emerging challenges require simple yet profound ideas to guide collective action. **Sustainable development** rests on the straightforward principle that **human progress must not compromise future generations' ability to meet their needs**. This simple insight is generating complex policy frameworks, technological innovations, and behavioral changes that may determine humanity's long-term survival and prosperity.

The **ongoing artificial intelligence revolution** stems from the simple goal of **creating machines that can perform tasks requiring human intelligence**. While the technical implementation involves sophisticated algorithms and

massive computational resources, the underlying aspiration remains elegantly simple and continues to drive innovations that may fundamentally alter human society.

As we navigate an increasingly complex world, the pattern of simple ideas generating large consequences **offers both hope and guidance**. The most pressing challenges of our time - **from inequality to environmental degradation to technological disruption** - may ultimately yield to insights that are profound in their simplicity and transformative in their implications. **"Truth is ever to be found in simplicity, and not in the multiplicity and confusion of things,"** observed **Isaac Newton**, reminding us that the most powerful ideas often emerge not from complexity but from our ability to perceive the elegant principles underlying apparent chaos. The future belongs not to those who can navigate complexity, but to those who **can discover the simple truths that will reshape our world**.

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