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CREATING CIVIL SERVANTS FOR THE NATION

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## Other topics

- SC Verdict on Revocation of Article 370
- Terms of Reference of 16th Finance Commission
- Revised Criminal Law Bills
- XPoSat
- The State of Food and Agriculture 2023
- India Skills Report 2024

# CONTENTS

# 1. POLITY & GOVERNANCE

## 1.1    CRIME IN INDIA REPORT

### Context
- The latest report on crime in India was released by the National Crime Record Bureau.

### Findings of the Report
#### Crime Rate in India
- With 661 cases per lakh population, **Kerala was the state with the highest crime rate in 2022.**
- It registered 2.35 lakh cases registered under the different sections of the <u>Indian Penal Code (IPC).</u>
- The total number of cases registered in UP was 4.01 lakh.
- With a crime rate of 171.6 against the national average of 258 per lakh of population, UP ranks 18th among Indian states.
- The state recorded a marginal rise in the crime rate from 154 in 2021 to 171.6 per lakh of the population.
- In 2021, **crime rates were generally low because of the Covid-induced lockdown.**

### Telangana cyber-crime rate highest in India: NCRB data
- Telangana **remains at the top of the cybercrime charts in India** for the second consecutive year, with a three-fold rise in cybercrime cases between 2020 and 2022.
- The state also **witnessed a rise in overall criminal cases.**
- The police policy of liberal registration of cases against every complaint received at police stations has contributed to this increase.
- The data reveals a significant number of cases registered under Section 420 (cheating) of IPC, including ATM frauds, online banking frauds, OTP frauds, and cheating frauds.
- There has also been **an increase in crime against senior citizens, murder cases, demand for dowry, road accidents, and a slight dip in overall cases of violent crimes.**

### India records 51 cases of crime against women every hour; over 4.4 lakh cases in 2022: NCRB report
- In 2022, there were 4,45,256 cases of crime against women, an increase from the previous years.
- The majority of these crimes were categorized as cruelty by the husband or his relatives, followed by kidnapping, assault, and rape.
- **Delhi had the highest crime rate, surpassing the national average.**
- Uttar Pradesh registered the highest number of cases.
- The NCRB emphasized the need for a comprehensive investigation into the factors contributing to this distressing trend.

### National Crime Records Bureau (NCRB)
#### About
- It is an Indian government agency responsible for collecting and analyzing, crime data as defined by the Indian Penal Code (IPC) and Special and Local Laws (SLL).
#### Headquarter
- NCRB is **headquartered in New Delhi** and is part of the Ministry of Home Affairs (MHA).
#### Establishment
- NCRB was **set up in 1986** to function as a repository of information on crime and criminals to assist the investigators in linking crime to the perpetrators.
#### Mission
- To provide Indian Police with Information Technology and Criminal Intelligence to enable them to uphold law and protect people.
- To provide leadership and excellence in crime analysis, particularly on serious and organized crime.

### Objectives

- Create and maintain secure sharable National Databases on crimes and criminals for law enforcement agencies and promote their use for public service delivery.
- Collect and process crime statistics at the national level and clearing house of information on crime and criminals both at National and International levels.
- Lead and coordinate the development of IT applications and create an enabling IT environment for Police organizations.
- National repository of fingerprints of all criminals.
- To evaluate, modernize, and promote automation in State Crime Records Bureau and State Finger Print Bureau.
- Training and capacity building in Police Forces in Information Technology and Finger Print Science.

## 1.2    POST OFFICE BILL, 2023

### Context

- After being passed in the Rajya Sabha, the Post Office Bill, 2023, was brought to the Lok Sabha for consideration

### Highlights of the Bill

- The Bill **replaces the Indian Post Office Act, of 1898**. The Act regulates India Post, a departmental undertaking of the central government.
- The government will not have exclusive privilege over conveying letters.
- Services to be provided by India Post will be prescribed under Rules.
- The Director General of Postal Services will be appointed to head India Post. He will have powers to make regulations on various matters including tariffs for services and supply of postage stamps.
- The government may intercept an article transmitted through India Post on specified grounds, including security of the state and public order.
- India Post will not incur any liability about its services, except any liability prescribed through Rules.

### Key Issues and Analysis

- The Bill **does not specify procedural safeguards for interception of articles transmitted through India Post**.
- Lack of safeguards may violate freedom of speech and expression, and the right to privacy of individuals.
- The **grounds for interception include 'emergency'**, which may be beyond reasonable restrictions under the Constitution.
- The Bill **exempts India Post from liability for lapses in postal services**.
- Liability may be prescribed through Rules by the central government, which also administers India Post. This may lead to conflict of interest.
- The Bill **does not specify any offences and penalties**. For instance, there are no consequences for the unauthorised opening of postal articles by a postal officer. This may have adverse implications for the right to privacy of consumers.

### PART A: Highlights of the Bill

#### Context

- Postal services **come under the Union List of the Constitution**. The Indian Post Office Act, of 1898 regulates the postal services offered by the central government. It grants the central government **exclusive privilege over the conveying of letters**. Postal services are offered through India Post, a departmental undertaking.

- On certain previous occasions, **significant amendments to the 1898 Act were proposed**, however, they did not come into force.5 A Bill passed by Parliament in 1986 sought to align the grounds for interception of an article being transmitted through post with the reasonable restrictions on the fundamental rights under the Constitution. The Bill did not receive the assent of the President and was later withdrawn. A Bill was introduced and referred to a Standing Committee in 2002, which included amendments to regulate private courier services under the Act. The Bill eventually lapsed. In 2006 and 2011, draft Bills were released, which also proposed amendments to regulate private courier services under the Act. However, the corresponding Bills were not introduced in Parliament.
- In 2017, the Act was amended to delegate the power to decide tariffs to the central government. Earlier, this power rested with Parliament. Recently, the Jan Vishwas (Amendment of Provisions) Act, 2023 removed all offences and penalties under the Act.
- In August 2023, the Post Office Bill, 2023 was **introduced in Rajya Sabha**. It **replaces the 1898 Act** and aims to simplify legislative framework to facilitate the evolution of India Post into a citizen-centric service network.

**Key Features**

- **Exclusive privileges of the central government:** The Act provides that wherever the central government establishes posts, it will have the exclusive privilege of conveying letters by post, as well as incidental services such as receiving, collecting, sending, and delivering letters. The Bill does not provide for such privileges. The Act provides for the issuance of postage stamps as per the prescribed Rules. The Bill also states that India Post will have the exclusive privilege over issuing postage stamps.
- **Services to be prescribed:** The Act specifies the services provided by India Post to include: (i) delivery of postal articles including letters, postcards, and parcels, and (ii) money orders. The Bill provides that India Post will provide services, as may be prescribed by the central government.
- **Director General to make regulations regarding services**: The Act, as well as the Bill, provides for the appointment of the Director General of Postal Services. Under the Act, the Director General has powers to decide the time and manner of delivery of postal services. The Bill provides that the Director General may make regulations regarding any activity necessary to provide postal services. He may also make regulations regarding charges for services, and supply and sale of postage stamps and postal stationery.
- **Powers to intercept postal articles:** The Act allows interception of an article being transmitted through post on certain grounds. An interception may be carried out on the occurrence of any public emergency, or in the interest of public safety or tranquillity. Such interceptions may be carried out by the central government, state governments, or any officer specially authorised by them. An intercepted shipment can be detained or disposed of by the officer in charge. The officer also has powers to open, detain, or destroy shipments carrying items prohibited under the Act or any other law.
- The Bill instead provides that interception of an article being transmitted through post may be carried out on the following grounds: (i) the security of the state, (ii) friendly relations with foreign states, (iii) public order, (iv)

emergency, (v) public safety, or (vi) contravention of the provisions of the Bill or any other laws. An officer empowered by the central government through a notification may carry out interception.

- **Examination of postal articles prohibited under law or liable for duty:** Under the Act, an officer in charge may examine a postal article if he suspects that it contains goods which are prohibited, or are liable to be paid duty upon. The Bill removes the powers of examination. It instead provides that in such cases, the central government may empower an officer of India Post to deliver the postal article to the customs authority or any other specified authority. The authority will then deal with the item in question.

- **Exemptions from liability:** The Act exempts the government from any liability related to the loss, mis-delivery, delay, or damage to a postal article. This does not apply where the liability is undertaken by the central government in express terms. Officers are also exempt from such liability unless they have acted fraudulently or wilfully. The Bill retains these exemptions. It also provides that the central government may prescribe liability with regard to services by India Post under the Rules.

- **Removal of offences and penalties:** The Act specified various offences and penalties, all of which were removed by the Jan Vishwas (Amendment of Provisions) Act, 2023. For instance, theft, misappropriation, or destruction of postal articles by an officer of the Post Office was punishable with imprisonment up to seven years and a fine. Sending certain prohibited items through post was punishable with imprisonment up to one year, a fine, or both. The Bill does not provide for any offences or consequences, except one. Amounts not paid by a user will be recoverable as arrears of land revenue.

## PART B: Key issues and analysis
### Regulation of postal services different from courier services

- Currently, there are distinct frameworks for regulation of similar postal services by public and private sectors. The Indian Post Office Act, 1898 establishes monopoly of the central government over conveying letters. Private courier services are currently not regulated under any specific legislation. This leads to certain key differences. For instance, the 1898 Act provides a framework for interception of articles transmitted through India Post. There is no such provision for private courier services. Another key difference is in the application of the consumer protection framework. The 1898 Act exempts the government from liability for any lapses in the services, except where such liability is undertaken in express terms. The Consumer Protection Act, 2019 does not apply to services by India Post, but it applies to private courier services. The Post Office Bill, 2023, seeking to replace the 1898 Act, retains these provisions. We discuss certain issues with these provisions below.

### Interception of articles transmitted through India Post

- The Bill empowers the government to intercept an article transmitted through post on following grounds: (i) security of the state, (ii) friendly relations with foreign states, (iii) public order, (iv) emergency, (v) public safety, or (vi) contravention of provisions of the Bill or any other laws. We discuss two related issues below.

### Lack of procedural safeguards may violate the fundamental rights of individuals

- The Bill does not specify any procedural safeguards against the interception of postal articles. This may violate the right to privacy, and the freedom of speech and expression. In the case of interception of telecommunications, the Supreme Court (1996) held that a just and fair procedure to regulate the power of interception must exist. Otherwise, it is not possible to safeguard the rights of citizens under Article 19(1)(a) (freedom of speech and expression) and Article 21 (right to privacy as a part of the right to life and liberty).[10] To address this, the Court had mandated several safeguards including: (i) establishing necessity for

interception, (ii) limiting the validity of interception orders, (iii) authorisation by high-ranking officials, and (iv) interception orders to be examined by a review committee headed by senior government functionaries.10

• A similar clause was introduced in the Indian Post Office (Amendment) Bill, 1986. The Bill was passed by both Houses of Parliament and sent to the President for his assent in December 1986. However, President Zail Singh neither assented nor returned the Bill to Parliament until he demitted office in July 1987. Later, President Venkataraman returned it to Parliament in January 1990 for reconsideration, and the Bill was withdrawn by the Vajpayee government in 2002.

## The ground of 'emergency' may be beyond the reasonable restrictions permitted under the Constitution

• The Bill allows interception of postal articles on the ground of 'emergency'. The 1898 Act has a similar ground of 'public emergency' for interception.

• The Law Commission (1968), while examining the 1898 Act, had observed that the term emergency is not explicitly defined, and thus gives a very wide ground for interception. It also observed that interception of postal articles may infringe upon the freedom of speech and expression in certain cases, such as where it contains letters, books, postcards, and newspapers.

• It added that a public emergency cannot be a constitutionally permissible ground for interception, if it does not affect the security of the state, public order, or any other grounds specified in the Constitution.

• The Supreme Court (2015) has held that arbitrary grounds for restricting freedom of speech and expression are unconstitutional.

## Exemption from liability for lapses in services

• The Bill states that notwithstanding any other law in force, India Post will not incur any liability about a service provided by India Post. However, the central government may prescribe liability about a service through Rules.

• The question is whether the Bill itself should provide for liability.

• While examining the application of the 1898 Act, the National Consumer Dispute Redressal Commission (2023) had held that the Consumer Protection Act, 2019 does not apply to postal services offered by the government.

• The Bill retains the provisions regarding liability under the 1898 Act. This implies that rights of consumers of postal services from India Post may not be adequately protected. Liability may be prescribed through Rules by the central government, which also administers India Post. This may lead to a conflict of interest.

• The framework under the Bill is in contrast with the law applicable in the case of Railways, which is also a commercial service provided by the central government. The Railway Claims Tribunal Act, 1987 establishes tribunals for disposing of complaints against the Indian Railways for lapses in services. These include grievances such as loss, damage, or non-delivery of goods, and refund of fares or freight.

## Removal of all offences and penalties

• The Jan Vishwas (Amendment of Provisions) Act, 2023 removed all offences and penalties under the 1898 Act.

• These included various offences committed by officers of the post office.

• The Bill retains this position, i.e., it does not provide for any offences and penalties.

• The question is whether this is appropriate.

• Under the Act, illegal opening of postal articles by a postal officer was punishable with imprisonment up to two years, a fine, or both.

• Persons other than postal officers were also penalised for opening a mail bag.

• In contrast, there will be no consequence against such actions under the Bill. This may have adverse implications for the right to privacy of individuals.

• Violations specific to postal services are not covered under other laws such as the Indian Penal Code (IPC). The IPC only punishes such

offences when accompanied by theft or misappropriation.

**Lack of clarity on consequences in certain cases**

- The Bill states that no officer will incur any liability about a service provided by India Post.
- This exemption does not apply where the officer has acted fraudulently or wilfully

caused loss, delay, or misdelivery of service. However, the Bill does not specify what consequences would follow if an officer commits such acts.

- Before the amendment under the Jan Vishwas Act, under the 1898 Act, these offences were punishable with imprisonment of up to two years, a fine, or both.

## 1.3    BHARAT NET PROJECT

### Context

- The Ministry of Communications said 6,658 gram panchayats had been made service-ready under the BharatNet Phase II project in Tamil Nadu.

### Details

- The National Optical Fibre Network (NOFN), **launched in October 2011**, was renamed the Bharat Net Project in 2015.
- The **Bharat Net Project is the world's largest broadband connectivity programme** for rural areas using optical fibre.
- It provides affordable broadband <u>connectivity of 2 Mbps to 20 Mbps for all households.</u>
- Under the Ministry of Communications, the **Department of Telecommunication implements the Bharat Net Project programme.**
- It offers an on-demand capacity for institutions in partnership with the private sector and states to realize Digital India's vision.
- The objective of the Bharat Net Project is to facilitate the delivery of e-health, e-governance, e-education, internet, e-banking, and other services to rural India.
- Bharat Net is a project of the Government of India to <u>digitally connect all the villages and Gram Panchayats (GPs) of India.</u>

### Features of the Bharat Net Project

- The Bharat Net Project aims to provide internet connectivity in remote and rural areas.

- It was launched with a vision to transform India into a knowledgeable economy and digitally empowered society.
- It was launched under the Digital India programme.
- It will bring transparency to the connectivity system.
- It provides high-speed digital internet connectivity in rural areas at affordable prices through an optical fibre.
- Through this project, all the families living in rural areas will get broadband connectivity, facilitating ease of life.
- Bharat Net Project will improve the standard of living of rural people.
- Rural people can avail of various kinds of online services through the implementation of this project.
- Students living in rural areas can take online classes, helping them achieve success.

### Services of Bharat Net Project

- Connectivity is provided to service providers like ISPs, TSPs, LCOs, MSOs, and government agencies through the Bharat Net Project to extend their services from block to GP.
- It is a middle-mile network between blocks to GPs.
- The following services are offered to the service providers and government agencies through the Bharat Net Project:

**Bandwidth Service**

- Using Gigabit Passive Optical Network (GPON) technology, GPs are offered point-to-multipoint and point-to-point bandwidth from blocks. The bandwidth is provided at

attractive and affordable prices for promoting the digital ecosystem.

- Every government agency and service provider who wants to provide services to the GPs can connect to Bharat Net at the block locations. However, the service providers need to offer their services to the end customers in the GPs using their technology.

## Dark Fibre Service

- Service providers can utilize dark fibre service on the new cable laid by Bharat Broadband Network Limited (BBNL) between the blocks and GPs. This cable is also called incremental cable.
- The incremental cable is offered from the fibre point of interconnect and a GP.
- There are 15,000 GPs where dark fiber is available.
- Dark fiber is offered at an affordable and attractive rate of Rs.2,250 per fibre per annum per km.

## Implementation of the Bharat Net Project

- The **Universal Service Obligation Fund (USOF) funds the entire Bharat Net Project**.
- The USOF was set up to improve telecom services in remote and rural areas of the country.
- The Bharat Net Project is implemented in phases.

## Significance of BharatNet

- BharatNet is a **key component of the Digital India initiative**, which aims to transform India into a knowledge-based economy and society. It bridges the digital divide between urban and rural areas and enhances the social and economic inclusion of rural citizens.
- It **provides affordable and reliable broadband access** to rural households, businesses, institutions, and government offices. It enables them to access information, opportunities, markets, and services that were previously inaccessible or costly.
- It **creates a platform for innovation and entrepreneurship** in rural areas. It supports the development of local solutions for local

problems and fosters a culture of creativity and collaboration among rural communities.

- It **generates employment and income opportunities** for rural youth and women. It creates a demand for skilled manpower for network installation, operation, maintenance, and service delivery. It also empowers rural women to participate in economic activities and decision-making processes.

## Steps Taken by Government for BharatNet

- **PM-WANI (Prime Minister Wi-Fi Access Network Interface) provides public Wi-Fi hotspots** in public places through a network of public data offices (PDOs).
- PMGDISHA (Pradhan Mantri Gramin Digital Saksharta Abhiyan) to make at least one person in every rural household digitally literate.
- CSC (Common Service Centre) provides a one-stop shop for various e-services such as banking, insurance, education, health, etc. through a network of village-level entrepreneurs (VLEs).
- **UMANG** (Unified Mobile Application for New-age Governance) provides a single platform for accessing various government services through mobile devices.

## Challenges Faced by BharatNet

- **Infrastructure:** Laying optical fibre cables in remote and challenging terrains presents logistical difficulties. Terrain variations, rough landscapes, and geographical barriers can make the installation process time-consuming and expensive. Overcoming these challenges requires meticulous planning, coordination with local authorities, and innovative engineering solutions.
- **Funding:** Establishing a comprehensive optical fibre network across rural India demands substantial financial resources. Securing the necessary funding and budget allocation for the project can be a persistent challenge. Balancing budget priorities and finding sustainable funding sources are crucial to ensure the initiative's successful implementation.

- **Maintenance and Sustainability:** Maintaining and sustaining the network in rural areas pose ongoing challenges. Harsh environmental conditions, wear and tear, and technical glitches can affect network reliability. Ensuring a consistent power supply and trained personnel for maintenance and troubleshooting are essential to prevent service disruptions and maintain the network's long-term viability.

- **Awareness and Adoption:** Introducing digital services to populations that may be unfamiliar with technology requires efforts to raise awareness and promote adoption. Many rural residents may lack digital literacy and an understanding of the benefits of digital services. Community engagement, training programs, and outreach campaigns are vital to encourage people to embrace and effectively utilize the services offered through BharatNet.

- Addressing these challenges is crucial to ensure the successful implementation and sustainability of BharatNe.

## Way Forward for BharatNet

- **Strengthening coordination and monitoring:** There is a need to strengthen the coordination and monitoring mechanism among various stakeholders involved in BharatNet, such as central and state governments, BBNL, private concessionaires, service providers, etc. A dedicated project management unit (PMU) can be set up to oversee the implementation and utilisation of BharatNet.

- **Enhancing awareness and demand**: There is a need to enhance the awareness and demand for BharatNet and e-services among rural users. This can be done by conducting awareness campaigns, training programs, demonstrations, etc. through various media and channels.

- **Improving affordability and quality:** There is a need to improve the affordability and quality of BharatNet and e-services for rural users. This can be done by reducing the tariffs, providing subsidies, incentives, or vouchers, ensuring adequate bandwidth, uptime, security, etc. The PM-WANI scheme can help in this regard by providing low-cost Wi-Fi access to rural users.

- **Increasing relevance and innovation**: There is a need to increase the relevance and innovation of BharatNet and e-services for rural users. This can be done by developing and offering local content and applications that cater to the needs and preferences of rural users. The UMANG app can help in this regard by providing a single platform for accessing various government services. The government can also encourage and support rural entrepreneurs and innovators to create solutions using BharatNet.

## 1.4    FREEBIES IN ELECTION

### Context

- The Supreme Court began hearing petitions seeking a judicial declaration that irrational freebies offered by political parties to lure voters during election time should be considered a "corrupt practice".

### What is a freebie?

- The informal word "freebie" implies a thing that is provided to a person by any organization, company or a state without paying for it or given out for free especially for gaining support or favor.

- Freebies play one of the crucial roles during elections in India because the amount of freebies in election manifesto dramatically determines your vote banks.

- Political parties make hefty promises to offer free electronic gadgets, waver of pending loans, free supply of electricity and water, monthly allowances to women and senior citizens, offering employment opportunities, etc. for securing their vote banks during elections.

## Welfare schemes and freebies

- The difference between freebies and welfare schemes is not always clear, but a general way to distinguish them is by their long-term impact on beneficiaries and society. Welfare schemes have a positive impact, while freebies can create dependency or distortions.
- Freebies are goods and services given free without any charge to the users. They are generally aimed at benefiting the targeted population in the short term. They are often seen as a way of luring voters or bribing them with populist promises.
- Some examples of freebies are free laptops, TVs, bicycles, electricity, water, etc.
- While Welfare schemes, on the other hand, are well thought-after plans that aim to benefit the target population and improve their standard of living and access to resources. They are typically aimed at fulfilling the constitutional obligations (Directive Principles of State Policy) towards citizens. They are often seen as a way of promoting social justice, equity, and human development.
- Some examples of welfare schemes are public distribution system (PDS), Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA), mid-day meal scheme, etc.

## Freebies in elections

- In India, political parties often use "freebies" to gain support from voters. From laptops and Smartphones to bicycles and even goats, there's no telling what freebies can provide. But why do they do it? What is the reason for giving all these gifts?
- The answer is simple: it is a strategy to win votes. And it has worked time and again in Indian elections. By promising free donations, political parties can take advantage of voters' desires for material possessions and entice them to vote for the party with the most generous list of donations. Free payments can effectively increase voter turnout, but their impact on voting behavior needs to be elucidated. While some studies show that

people are more likely to vote for a party that gives them a free gift, other studies have found no such link. At the end of the day, it's up to each voter to decide if a free gift will affect their vote. But one thing is certain: in India, handing out freebies is still essential to winning elections.

- States like Rajasthan, Madhya Pradesh and Punjab have announced free tolls for smartphones, gas bottles, electricity etc. Whoever forms the next government will inherit the financial burden of tolls.
- The Supreme Court has issued a notice to the Central Government of India, the Madhya Pradesh Government, the Rajasthan Government and the Election Commission on a PIL alleging misuse of public funds to distribute cash and other freebies.

## Advantages of freebies

### Public information and engagement:

- Free government offers can increase public trust and satisfaction with government by demonstrating its responsibility and accountability to the people. In addition, gifts can create opportunities for feedback and dialogue between government and citizens, which increases transparency and democracy. A Center for Policy Research study found that free gifts such as laptops, bicycles and cash transfers had a positive effect on voter turnout, political awareness and satisfaction with the government in Uttar Pradesh and Tamil Nadu.

### Economic growth:

- Free payments can stimulate economic growth by increasing labor productivity, especially in less developed regions. For example, free gifts such as laptops, bicycles or sewing machines can improve the skills, mobility and income opportunities of poor and rural people. A NITI Aayog report found that in Bihar and West Bengal, free gifts such as bicycles to schoolgirls increased their enrollment and learning rates, reduced dropouts and improved their academic performance.

### Social welfare:

- These can provide basic needs and social welfare like food, education, health care, electricity etc. to the poor and marginalized sections of society. For example, free gifts such as uniforms, textbooks or health insurance can improve literacy. Health and quality of life of the poor and disadvantaged groups.
- A study by the World Bank estimated that free payments such as Public Distribution System and #40;PDSand#41; reduced India's poverty ratio by 7 percent in 2011-12. A study conducted by the NSSO found that free gifts such as health insurance under the Rashtriya Swasthya Bima Yojana (RSBY) reduced out-of-pocket expenses and catastrophic health events among sub-poor households.

### Income equality:

- Free payments can reduce income inequality and poverty by distributing wealth and resources more fairly. For example, free gifts such as loan waivers or cash transfers can give households in debt or on low incomes access to real estate, loans or income support. A report by the Reserve Bank of India analyzed that the loan waiver eased the debt burden and improved the creditworthiness of distressed farmers.

## Disadvantages of freebies

### Disadvantages of dependency syndrome:

- Freebies can create a pattern of negative dependency and entitlement among recipients, who may expect more free gifts and be less motivated to make an effort or pay taxes. For example, free gifts like Rs 1/kg rice or free electricity can reduce the responsibility and accountability of beneficiaries and make them dependent on foreign aid. A poll by the Association for Democratic Reforms found that 41% of Tamil Nadu voters considered free grants an important factor in voting, while 59% said they were satisfied with the state government's performance.

### Fiscal burden:

- Gratuities can have a negative impact on the health and macroeconomic stability of the finances of a country or state by increasing public spending, subsidies, budget deficits, debt and inflation. For example, free subsidies such as farm loan waivers, unemployment subsidies or pension schemes can limit the country's fiscal resources and fiscal discipline, affecting the country's ability to invest in other sectors or pay its liabilities. An RBI report analyzedthat bonuses such as the Indira Gandhi National Old Age Pension Scheme (IGNOAPS) for the elderly posed a financial risk to the central and state governments as they meant increased pension liabilities as the population aged.

### Misuse of resources:

- Gratuities can distort spending priorities and allocation of resources by diverting funds from more productive and important sectors such as infrastructure, agriculture, industry, etc. For example, free cell phones, laptops, or air conditioning can consume a large portion of public spending and crowd out investment in public goods such as roads, bridges, irrigation systems, or power plants. The NITI Aayog report criticized that free gifts such as laptops given by the Uttar Pradesh government diverted money from more pressing needs such as improving school infrastructure, teacher quality or learning outcomes.

### Quality compromise:

- Free payments can reduce the quality and competitiveness of free goods and services, reducing incentives for innovation and improvement. For example, free gifts such as bicycles or laptops may be of inferior quality or outdated technology compared to gifts available on the market or manufactured in other countries. A report by the Center for the Development of Advanced Computing estimated that free gifts offered by various state governments, such as laptops, were based on outdated technology and software that limited their functionality and effectiveness.

**Impact on the environment:**

- Tolls can have a negative impact on the environment because they encourage the overuse and waste of natural resources such as water, electricity or fuel. For example, free electricity, free water or free gas bottles can reduce incentives for saving and efficiency and increase carbon footprint and pollution levels. The CAG report found that free electricity to farmers in Punjab led to overuse and waste of energy, low tax compliance and poor quality of service at the state-run power plant.

**Conclusion**

- Instead of a politically motivated will, what is needed now is a charitable approach. They have to consider the economic impact, how it affects the finances of the country, and how it improves the life of the beneficiary. In a democracy, voters have the right to stop or allow free march. It is important to agree on how to manage absurd freebies, ensuring that voters are not swayed by false promises.

## 1.5   BILL RELATED TO CEC AND EC SERVICE CONDITIONS

### Context

- The Rajya Sabha passed the Chief Election Commissioner and Other Election Commissioners (Appointment, Conditions of Service and Term of Office) Bill, 2023.

### Chief Election Commissioner and Other Election Commissioners (Appointment, Conditions of Service and Term of Office) Bill

- The Chief Election Commissioner and Other Election Commissioners (Appointment, Conditions of Service, And Term of Office) Bill, 2023, was introduced in Rajya Sabha on August 10, 2023. It repeals the 1991 Act and provides for the appointment process and conditions of services for the CEC and ECs.

### Key Features

- **Election Commission:** The Election Commission will consist of a Chief Election Commissioner (CEC) and other Election Commissioners (ECs). The President will periodically fix the number of ECs.
- **Appointment of the Commission**: The Commission will be appointed by the President, upon the recommendation of the Selection Committee. The Selection Committee will comprise the Prime Minister, Cabinet Minister, and Leader of Opposition in Lok Sabha (or leader of the single largest opposition party). A Search Committee headed by the Cabinet Secretary will suggest five names to the Selection Committee. The Selection Committee may consider any person other than those suggested by the Search Committee.
- **Eligibility criteria:** The CEC and ECs must: (i) be persons of integrity, (ii) have knowledge and experience in the management and conduct of elections, and (iii) be or have been Secretary (or equivalent) to the government.
- Term and reappointment: Members of the Election Commission will hold office for six years, or until they attain the age of 65 years, whichever is earlier. Members of the Commission cannot be re-appointed. If an EC is appointed as a CEC, the overall period of the term may not be more than six years.
- **Salary and pension:** The salary, allowances, and other conditions of service of the CEC and ECs will be equivalent to that of the Cabinet Secretary. They will have an option to draw pension and other retirement benefits from the service that they belonged to previously.
- Removal: The Bill retains the manner of removal of CEC and ECs as specified in the Constitution.  The CEC may be removed in the same manner and on the same grounds as a Supreme Court Judge. ECs may be removed only upon the recommendation of the CEC.

## Key issues and analysis

### Independence of the Election Commission

- The Constitution envisages the Election Commission (ECI) as an independent body that is responsible for conducting free and fair elections. The Supreme Court has noted that such a body should be completely insulated from external pressures from the ruling party, and must not be chosen by the Executive exclusively.
- Members of the Constituent Assembly had also noted that the responsibility of conducting elections should be entrusted to people who are free from political influences and local pressures.
- Dr. B.R. Ambedkar had stated that for elections to be free in the real sense of the word, they should be taken out of the hands of the government of the day.
- The Supreme Court (2023) has also stated that any action of the ECI which treats political parties in an uneven or arbitrary manner could breach the right to equality.
- Over several judgements related to judicial independence, the Court has established that independence requires insulation from the government during appointments and while performing its functions.
- Several provisions in the Bill may undermine the independence of the ECI.

### Selection Committee is dominated by the government

- The appointment of the CEC and ECs under Article 324 is subject to a law made by Parliament. The Supreme Court (2023) noted that the Constituent Assembly intended to provide for an independent Election Commission whose appointment is regulated by law and not decided by the Executive.
- The Court ruled that until Parliament made a law for such process, CEC and ECs will be appointed on the recommendation of a Selection Committee. This Committee will comprise the Prime Minister, the Chief Justice of India, and the Leader of Opposition in Lok Sabha (or leader of the largest opposition party).
- The Bill specifies that the Selection Committee will consist of the Prime Minister, a Cabinet Minister, and the Leader of Opposition in Lok Sabha (or leader of the largest opposition party). Thus, the Selection Committee has a majority of members from the government of the day, which may undermine the independence of the ECI.
- Note that heads of several other independent bodies such as the Chief Information Commission and the Central Vigilance Commission are appointed by a panel similar to the one proposed in this Bill.
- However, for constitutional bodies such as the Union Public Service Commission and the Comptroller and Auditor General of India, the appointment is made by the President. The Supreme Court noted that the ECI stands on a higher pedestal in the constitutional scheme due to its functions and duties. This is reflected in the fact that the ECI's appointments will be made subject to a law made by Parliament.

**Table 1: Suggestions made by various Commissions/Courts for composition of the Selection Committee**

| Body | Members |
|---|---|
| Goswami Committee (1990) | • For CEC: Appointed by the President in consultation with the Chief Justice + Leader of Opposition of Lok Sabha (or leader of the largest party in Lok Sabha).<br>• For EC: Appointed by the President in consultation with the Chief Justice + Leader of Opposition of Lok Sabha (or leader of the largest party in Lok Sabha) + CEC. |
| The Constitution (Seventieth Amendment) Bill 1990* | • Chairman of Rajya Sabha + Speaker of Lok Sabha + Leader of the Opposition (or the leader of the largest party) in Lok Sabha. The CEC |

| | | |
|---|---|---|
| | | was further made a part of the consultative process in the appointment of the Election Commissioners. |
| National Commission to Review the Working of the Constitution Report (2002) | | • Prime Minister + Leader of the Opposition in Lok Sabha + the Leader of the Opposition in Rajya Sabha + the Speaker of Lok Sabha + the Deputy Chairman of Rajya Sabha. |
| Law Commission (2015) | | • Prime Minister + the Leader of Opposition of Lok Sabha (or the leader of the largest opposition party in Lok Sabha) + the Chief Justice. |
| Supreme Court (2023) | | • Prime Minister + Leader of Opposition in Lok Sabha (or leader of single largest opposition party in Lok Sabha) + Chief Justice. |

**Note:** * *Introduced in Rajya Sabha and withdrawn by the House in 1994.*
**Sources:** *Writ Petition (c) No. 104 of 2015, Anoop Baranwal v Union of India, Supreme Court, March 2, 2023; PRS.*

**Table 2: Selection Process of the Election Commission in certain countries**

| Country | Appointing Authority | Selection Committee/Process |
|---|---|---|
| South Africa | President | • President of the Constitutional Court (Chairperson), representative of the Human Rights Court, representative of the Commission on Gender Equality, and the public prosecutor. |
| United Kingdom | The monarch, upon approval by the House. | • The Speaker's Committee on the Electoral Commission with MPs as members, oversees the recruitment of electoral commissioners.<br>• The candidates for these posts are then approved by the House of Commons and appointed by the British monarch.<br>• The Speaker asks the Leader of the House to table a motion for an address to appoint the recommended candidates. |
| United States | President | • The Commission is appointed by the President and confirmed by the Senate. |
| Canada | - | • Appointed by a resolution of the House of Commons. |

**Sources:** *Writ Petition (c) No. 104 of 2015, Anoop Baranwal v Union of India, Supreme Court, March 2, 2023; PRS.*

**Selection Committee's recommendations to be valid in spite of vacancy or defect in constitution**

- The Bill upholds the validity of the Selection Committee even if there is a vacancy or defect in constituting the Committee. Similar provisions exist in some other laws for selection of members to statutory bodies.
- However, a vacancy in this Committee will only arise in certain circumstances. Of the three members in the Committee, the posts of the Prime Minister and a Cabinet Minister cannot be vacant. The post of the Leader of Opposition in Lok Sabha may be vacant, if Lok Sabha is dissolved. Thus, a vacancy may arise only before a general election, and in such a case, the Selection Committee will consist exclusively of ruling party members.

## Selection Committee may overlook Search Committee's suggestions

- Under the Bill, the Selection Committee selects names from a panel of five people suggested by the Search Committee. The Selection Committee may go beyond the names suggested by the Search Committee, and choose any other candidate. On one hand, this may undermine the role of the Search Committee which is specifically constituted to look for capable and qualified candidates. On the other hand, the provision may ensure that the candidates considered for CEC and EC positions are not controlled solely by the Search Committee, which is entirely composed of civil servants.

## Salary of CEC and ECs to be decided by the government

- Under the 1991 Act, salaries of CEC and ECs are equivalent to the salary of a Supreme Court Judge.2 The Bill equates the salary of the CEC and ECs to that of the Cabinet Secretary of the government. Both salaries are currently equivalent but they are regulated differently. Article 125 of the Constitution requires that the salary of a Supreme Court Judge be fixed by an Act of Parliament. However, the salary of a Cabinet Secretary salary is fixed by the government upon the recommendation of the Central Pay Commission. Thus, the Bill may be allowing for greater control of the Executive in determining the salary of the CEC and ECs.

## Eligibility criteria may exclude other suitable candidates

- Under the Bill, only a person who is or has been at a rank equivalent to Secretary to the government will be eligible to be the CEC or EC. In addition to administrative functions, an Election Commission also acts in a quasi-judicial capacity. It decides on the disqualification of Members of Parliament and State Legislatures and adjudicates disputes such as those arising out of allotting symbols, or registering political parties. By limiting the eligibility criteria of the CEC and ECs to civil servants, the Bill may exclude other qualified individuals from such posts.

- In other countries, members of bodies equivalent to the ECI have a wider eligibility criteria. For instance, in the United States, members must not be elected or appointed officers, or hold federal government positions in the executive, legislative, or judicial branch at the time of their appointment. In South Africa, the Election Commission is a five-member body, of which one must be a judge. All members must be South African citizens who do not have high party-political profiles.

## Other issues related to the Election Commission's independence

- The Supreme Court and several committees including the Goswami Committee (1990) have made suggestions to ensure independence of the ECI. These relate to: (i) the removal process of CEC and ECs, and (ii) administrative independence of the ECI. These suggestions have not been addressed in the Bill.

## Lack of parity in removal of the CEC and ECs

- Under Article 324 of the Constitution, the CEC can only be removed from his office in a manner similar to that of a Supreme Court judge.

- An EC can be removed from office upon the recommendation of the CEC. The Bill retains these grounds for removal under the Constitution. However, there may be concerns about the lack of parity in the removal procedure of the CEC and the ECs.

- Until 1991, the ECI did not consist of any ECs. Following the appointment of the ECs, the Supreme Court (1995) examined the hierarchy between the CEC and an EC and stated that ECs are considered to be at par with the CEC.[5] The Bill also provides an equal status for the CEC and EC with both positions receiving the same salary, and having an equal say in decision-making. In 2023, the Supreme Court examined the issue and said that it could not mandate parity in removal, as the Constitution provides for different removal processes. It stated that extending the protection to ECs to safeguard their independence is a matter for Parliament to consider.3 Any changes to the removal

process of the ECs would require a Constitutional Amendment.

## Administrative independence of the Commission

- The Goswami Committee and the ECI have recommended an independent secretariat for the ECI along the lines of Lok Sabha, Rajya Sabha, the Supreme Court, and High Courts. The Supreme Court (2023) also noted the importance of having an independent secretariat for the functioning of the ECI.

## Conclusion

- This bill has quickly received criticism from opposition groups and various stakeholders as they view it as potentially weakening the Election Commission.

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## 1.6 SPECIAL PROVISIONS FOR STATES

### In News

- While India's Constitution tilts towards the Centre on certain areas, not all states are equal either. Right after Article 370, the Constitution creates special provisions for at least nine states, from **Article 371A-I.**

### Background

- In the Indian context, while states do have autonomy, the **Constitution tilts towards the Centre in certain areas, thus making it quasi-federal.**
- The Seventh Schedule of the Constitution contains the Union, State, and Concurrent lists that prescribe subjects that the Centre and states are empowered to legislate upon.
- For those in the concurrent list — which both the Centre and state can legislate upon — **the Union law would prevail in case of a conflict between the law made by Parliament and the state legislature.**

### Special status to states

- **Part XXI of the Constitution of India** is a compilation of laws about the constitution of India as a country and the union of states that it is made of. This part of the constitution consists of *Articles on Temporary, Transitional, and Special Provisions*.

### What is the difference between special category status and special status?

- The constitution provides special status through an Act that has to be **passed by a 2/3rds majority in both houses of Parliament** whereas the special category status is granted by the National Development Council, which is an administrative body of the government.
- For example, **Jammu and Kashmir enjoyed a special status as per Article 370** and also a special category status. But now **that Article 35A has been scrapped** and it has become a union territory with the legislature, special category status doesn't apply to J&K anymore.
- **Special status empowers legislative and political rights** while special category status deals only with economic, administrative and financial aspects.

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### Special Category Status (SCS)

- A Special Category Status (SCS) is a classification given by the Centre to assist in the development of those states that face geographical and socio-economic disadvantages like hilly terrains, strategic international borders, economic and infrastructural backwardness, and non-viable state finances.

### Special category status - Historical background

- The concept of a special category status was first introduced in 1969 when the fifth Finance Commission sought to provide certain disadvantaged states with preferential treatment in the form of central assistance and tax breaks, establishing special development boards, reservation in local government jobs, educational institutions, etc.

- This formula was named after the then Deputy Chairman of the Planning Commission, Dr Gadgil Mukherjee and is related to the transfer of assistance to the states by centre under various schemes.
- Initially, three states; Assam, Nagaland, and Jammu & Kashmir were granted special status but from 1974-1979, five more states were added under the special category. These include Himachal Pradesh, Manipur, Meghalaya, Sikkim and Tripura.
- In 1990, with the addition of Arunachal Pradesh and Mizoram, the states increased to 10. The state of Uttarakhand was given special category status in 2001.
- But after the dissolution of the planning commission and the formation of NITI Aayog, the recommendations of the 14th Finance Commission were implemented which meant the discontinuation of the Gadgil formula-based grants.

## The 14th Finance Commission effectively removed the concept of special category status after its recommendations were accepted in 2015.

- The rationale for special status is that certain states, because of inherent features, have a low resource base and cannot mobilize resources for development.

## Who grants special status to states?

- The decision to grant special category status lies with the National Development Council, composed of the prime minister, union ministers, chief ministers, and members of the planning commission, who guide and review the work of the commission.
- Special category status for plan assistance has been granted in the past by the National Development Council (NDC) to some states that are characterized by several features necessitating special consideration.

## Criteria for special category status:

- Hilly and difficult terrain
- Low population density or sizeable share of tribal population
- Strategic location along borders with neighboring countries
- Economic and infrastructural backwardness
- Non-viable nature of state finances

## Can special category status be granted to more states now?

- In the present scenario, it is believed that **no more states can be given the status of a special category state.**
- The Constitution of India does not include any provision for the categorization of any state in India as a 'special category state.
- However, a wide range of provisions are available to as many as 10 states that have been listed under Articles 371, 371-A to 371-H, and 371-J.
- Some of these states are Maharashtra and Gujarat, Nagaland, Assam, Manipur, Andhra Pradesh, Sikkim, Mizoram, Arunachal Pradesh and Telangana and Goa. (Art 371I deals with Goa, but does not include any provision that can be termed 'special'.)
- While these set of provisions were incorporated into the Constitution by Parliament through amendments under Article 368, Articles 370 and 371 have been part of the Constitution from the time of its commencement on January 26, 1950.

## Why these special provisions?

- The intention behind these provisions is to safeguard the interest and aspirations of certain backward regions or to protect cultural and economic interests of the tribal people or to deal with the disturbed law and order in some parts.

## Benefits states confer with special category status:

States which are granted special category status enjoy several benefits.

1. The central government bears 90 percent of the state expenditure on all centrally-sponsored schemes and external aid while rest 10 percent is given as loan to state at zero percent rate of interest.
2. Preferential treatment in getting central funds.
3. **Concession on excise duty** to attract industries to the state.
4. 30 percent of the Centre's gross budget also goes to special category states.
5. These states can avail the **benefit of debt-swapping** and debt relief schemes.
6. States with special category status are **exempted from customs duty, corporate tax, income tax** and other taxes to attract investment.
7. Special category states have the facility that if they have unspent money in a financial year; it does not lapse and gets carry forward for the next financial year.

## Which states have been demanding special category status

- Andhra Pradesh
- Bihar
- Goa
- Odisha
- Rajasthan
- Right after Article 370, the Constitution creates special provisions for at least nine states, from Article 371A-I.
- All these exceptions are under a Section of the Constitution titled *"Temporary, Transitional and Special Provisions",* which indicates that these provisions would be operable till the crisis — either secessionist sentiments or war — ceases. However, despite the "temporary" tag, none of the provisions contain an explicit expiry date.

## States that have special provisions under Article 371(A-J)

| *Article 371 – Maharashtra and Gujarat* | • Governors of the states of Maharashtra and Gujarat are given special responsibilities to set up development boards in regions such as Vidarbha, Marathwada, Kutchh, etc. |
|---|---|
| *Article 371A – Nagaland* | • Article 371A of the Constitution mainly states that no act of Parliament would apply to the state of Nagaland in matters relating to religious or social practices of Nagas, Naga customary law and procedure, administration of civil or criminal justice involving decisions according to Naga customary law and ownership and transfer of land and its resources.<br>• The Legislative Assembly of Nagaland must pass a resolution for an act to apply to the state.<br>• The governor is given special responsibilities concerning law and order in the state as well. |
| *Article 371B – Assam* | • According to the special provision under Article 371B, the president may provide for the Constitution and functions of a committee of Legislative Assembly of the state consisting of members elected from the tribal areas of Assam. |
| *Article 371C – Manipur* | • The special provision under Article 371C in the case of Manipur is similar to 371B for Assam. Here, too, the president may provide for the Constitution and |

| | functions of a committee of Legislative Assembly of the state, but consisting of members elected from the hill areas of Manipur.<br>• The governor must submit an annual report to the president regarding the administration of hill areas as well. |
|---|---|
| *Article 371D & E – Andhra Pradesh* | • Article 371D, which was added to the Constitution in 1974, provides equitable opportunities and facilities for the people of the state and safeguards their rights in matters of employment and education. The state government may organise civil posts or direct recruitment to posts in local cadre as required.<br>• Article 371E states that the Parliament may by law provide for the establishment of a University in Andhra Pradesh. |
| *Article 371F – Sikkim* | • Article 371F was incorporated into the Constitution in 1975. It states that the Legislative Assembly shall consist of not less than 30 members. In order to protect the rights and interests of the different sections of the population in the state of Sikkim, seats in the assembly are provided to people of these different sections. |
| *Article 371G – Mizoram* | • The Legislative Assembly of the state of Mizoram must consist of not less than 40 members.<br>• In addition, following the same provisions as Nagaland, an act of Parliament would not apply to Mizoram in matters relating to religious or social practices of Mizo, Mizo customary law and procedure, administration of civil or criminal justice involving decisions according to Mizo customary law, ownership and transfer of land and its resources. |
| *Article 371H – Arunachal Pradesh* | • The Legislative Assembly of the state of Mizoram must consist of not less than 30 members. The governor will have special responsibility with respect to law and order in the state. |
| *Article 371I – Goa* | • The Legislative Assembly of the state of Goa must consist of not less than 30 members. |
| *Article 371J* | • Article 371J grants special status to six backward districts of Hyderabad-Karnataka region. The special provision requires that a separate development board be established for these regions (similar to Maharashtra and Gujarat) and also ensures local reservation in education and government jobs. |

## Conclusion

- Even in this quasi-federal structure that leans more toward the Centre, **not all states are equal.**
- India's plurality necessitates such an arrangement and the Constitution provides for differentiated equality for states depending on various factors, ranging from fiscal, political, and administrative. However, an argument is made against **asymmetric federalism**, that the so-called special statuses **sow seeds of regionalism and separatism and that it impacts 'national integration.'**
- While **Article 370**, which formalized India's relationship with the state of Jammu and Kashmir, is **touted as the most obvious example of asymmetric federalism in India**, several other states enjoy varying degrees of autonomy and relationship with the Centre.
- With the special status of the State of Jammu and Kashmir being revoked there emerges a new hope for us that **someday the remaining special provisions for the rest of the States shall also be withdrawn**. After all, **special treatment to anyone, even to a State is repugnant to the essence of a democratic nation, where each and everyone has been ensured equality.**

## 1.7    PLACES OF WORSHIP ACT

### Context
- The Allahabad High Court held that a suit filed in 1991 over the Gyanvapi Mosque is not barred under provisions of the Places of Worship Act.

### What are the Places of Worship Act and what are its Provisions?
- It is described **as "An Act to prohibit conversion of any place of worship and to provide for the maintenance of the religious character of any place of worship as it existed on the 15th day of August 1947, and for matters connected therewith or incidental thereto."**
- The Act was brought by the Congress government of **Prime Minister P V Narasimha Rao** when the Ram Temple movement was at its peak.

#### Exemption
1. The **disputed site at Ayodhya was exempted from the Act**. Due to this exemption, the trial in the Ayodhya case proceeded even after the enforcement of this law.
   *Besides the Ayodhya dispute, the Act also exempted:*
2. Any place of worship which is an ancient and historical monument, or an archaeological site covered by the Ancient Monuments and Archaeological Sites and Remains Act, 1958.
3. A suit that has been finally settled or disposed of.
4. Any dispute that has been settled by the parties or conversion of any place that took place by acquiescence before the Act commenced.

#### Criticism
- The law has been challenged on the ground that it bars judicial review, which is a basic feature of the Constitution, imposes an **"arbitrary irrational retrospective cutoff date,"** and abridges the right to religion of Hindus, Jains, Buddhists, and Sikhs.

### What are its Provisions?

| | |
|---|---|
| *Section 3* | • This section of the Act bars the conversion, in full or part, of a place of worship of any religious denomination into a place of worship of a different religious denomination or even a different segment of the same religious denomination. |
| *Section 4(1)* | • It declares that the religious character of a place of worship "shall continue to be the same as it existed" on 15th August 1947. |
| *Section 4(2)* | • It says any suit or legal proceeding with respect to the conversion of the religious character of any place of worship existing on 15th August, 1947, pending before any court, shall abate and no fresh suit or legal proceedings shall be instituted. <br> • The proviso to this subsection saves suits, appeals, and legal proceedings that are pending on the date of commencement of the Act if they pertain to the conversion of the religious character of a place of worship after the cut-off date. |
| *Section 5* | • Nothing contained in this Act shall apply to the place or place of worship commonly known as Ram Janma Bhumi-Babri Masjid situated in Ayodhya in the State of Uttar Pradesh and to any suit, appeal or other proceeding relating to the said place or place of worship. |
| *Section 6* | • Whoever contravenes the provisions of section 3 shall be punishable with imprisonment for a term which may extend to three years and shall also be liable to fine. |

| | |
|---|---|
| | • Whoever attempts to commit any offence punishable under sub-section (1) or to cause such offence to be committed and in such attempt does any act towards the commission of the offence shall be punishable with the punishment provided for the offence.<br>• Whoever abets, or is a party to a criminal conspiracy to commit, an offence punishable under sub-section (1) shall, whether such offence be or be not committed in consequence of such abetment or in pursuance of such criminal conspiracy, and notwithstanding anything contained in section 116 of the Indian Penal Code (45 of 1860), be punishable with the punishment provided for the offence. |
| *Section 7* | • The provisions of this Act shall have effect notwithstanding anything inconsistent therewith contained in any other law for the time being in force or any instrument having effect by any law other than this Act. |

## What Supreme Court said about the Places of Worship Act, 1991

- While delivering the Ayodhya verdict in 2019, the Supreme Court **referred to the Places of Worship Act and said that it manifests the secular values of the Constitution and strictly prohibits retrogression.**
- The law addresses itself to the State as much as to every citizen of the nation. Its norms bind those who govern the affairs of the nation at every level.
- Those **norms implement the Fundamental Duties under Article 51A and are hence positive mandates to every citizen as well**.
- The State, has by enacting the law, _enforced a constitutional commitment and operationalized its constitutional obligations to uphold the equality of all religions and secularism which is a part of the basic structure of the Constitution."_

## 1.8    SUSPENSION OF MEMBERS OF PARLIAMENT

### Context
- In total, 141 MPs were suspended.

### What is the reason for suspending an MP?
- The general principle is that it is the role and duty of the Presiding Officer — Speaker of Lok Sabha and Chairman of Rajya Sabha — to maintain order so that the House can function smoothly. To ensure that proceedings are conducted in the proper manner, the Speaker/ Chairman is empowered to force a Member to withdraw from the House.

### What are the Rules under which the Presiding Officer acts?
- Rule Number 373 of the Rules of Procedure and Conduct of Business says: "The Speaker, if he is of the opinion that the conduct of any Member is grossly disorderly, may direct such Member to withdraw immediately from the House, and any Member so ordered to withdraw shall do so forthwith and shall remain absent during the remainder of the day's sitting."

- To deal with more recalcitrant Members, the Speaker make take recourse to Rules 374 and 374A.

### Rule 374 says:
- "(1) The Speaker may, if deems it necessary, name a Member who disregards the authority of the Chair or abuses the rules of the House by persistently and wilfully obstructing the business thereof.
- "(2) If a Member is so named by the Speaker, the Speaker shall, on a motion being made forthwith put the question that the Member (naming such Member) be suspended from the service of the House for a period not exceeding the remainder of the session: Provided that the House may, at any time, on a motion being made, resolve that such suspension be terminated.

- "(3) A member suspended under this rule shall forthwith withdraw from the precincts of the House."
- Rule 374A was incorporated in the Rule Book on December 5, 2001. The intention was to skirt around the necessity of moving and adopting a motion for suspension.
- According to Rule 374A: "(1) Notwithstanding anything contained in rules 373 and 374, in the event of grave disorder occasioned by a Member coming into the well of the House or abusing the Rules of the House persistently and wilfully obstructing its business by shouting slogans or otherwise, such Member shall, on being named by the Speaker, stand automatically suspended from the service of the House for five consecutive sittings or the remainder of the session, whichever is less: Provided that the House may, at any time, on a motion being made, resolve that such suspension be terminated.
- "(2) On the Speaker announcing the suspension under this rule, the Member shall forthwith withdraw from the precincts of the House."

## And what happens in Rajya Sabha?
- It's largely similar.
- Like the Speaker in Lok Sabha, the Chairman of Rajya Sabha is empowered under Rule Number 255 of its Rule Book to "direct any Member whose conduct is in his opinion grossly disorderly to withdraw immediately" from the House.
- Under Rule 256, the Chairman may "name a Member who disregards the authority of the Chair or abuses the rules of the Council by persistently and wilfully obstructing" business. In such a situation, the **House may adopt a motion suspending the Member from the service of the House for a period not exceeding the remainder of the session.**
- The House may, by another motion, **terminate the suspension.**

## Isn't the barring of an elected representative of the people an extreme step?
- Every instance of suspension of an MP triggers strong statements on both sides. It is generally agreed **that a balance has to be struck, and that the solution to unruly behaviour has to be long-term and consistent with democratic values.**
- It has been pointed out that in cases such as these, the ruling party of the day invariably insists on the maintenance of discipline, just as the opposition insists on its right to protest. And their positions often change when their roles flip.

## 1.9    REVISION OF CRIMINAL BILLS

## Context
- The Lok Sabha passed the three revised criminal law bills, namely, the Bharatiya Nyaya (Second) Sanhita, proposing to replace the Indian Penal Code, the Bharatiya Nagarik Suraksha (Second) Sanhita, proposing to replace the Code of Criminal Procedure, and the Bharatiya Sakshya (Second) Sanhita, which seeks to replace the Indian Evidence Act.

## Bharatiya Nyaya (Second) Sanhita (BNS2)
### Key Features
**Key changes in the BNS2 include:**

- **Offences against the body:** The IPC criminalises acts such as murder, abetment of suicide, assault and causing grievous hurt. The BNS2 retains these provisions. It adds new offences such as organised crime, terrorism, and murder or grievous hurt by a group on certain grounds.
- **Sexual offences against women:** The IPC criminalises acts such as rape, voyeurism, stalking and insulting the modesty of a woman. The BNS2 retains these provisions. It increases the threshold for the victim to be classified as a major, in the case of gang rape, from 16 to 18 years of age. It also

criminalises sexual intercourse with a woman by deceitful means or making false promises.

- **Sedition:** The BNS2 removes the offence of sedition. It instead penalises the following: (i) exciting or attempting to excite secession, armed rebellion, or subversive activities, (ii) encouraging feelings of separatist activities, or (iii) endangering the sovereignty or unity and integrity of India. These offences may involve exchange of words or signs, electronic communication, or use of financial means.

- **Terrorism:** Terrorism includes an act that intends to: (i) threaten the unity, integrity, security or economic security of the country, or (ii) strike terror in the people or any section of people in India. Punishment for attempting or committing terrorism includes: (i) death or life imprisonment, and a fine, if it results in death of a person, or (ii) imprisonment between five years and life, and a fine.

- **Organised crime:** Organised crime includes offences such as kidnapping, extortion, contract killing, land grabbing, financial scams, and cybercrime carried out on behalf of a crime syndicate. Attempting or committing organised crime will be punishable with: (i) death or life imprisonment and a fine of Rs 10 lakh, if it results in death of a person, or (ii) imprisonment between five years and life, and a fine of at least five lakh rupees.

- **Mob lynching:** The BNS2 adds murder or grievous hurt by five or more people on specified grounds, as an offence. These grounds include race, caste, sex, language, or personal belief. The punishment for such murder is life imprisonment or death.

- **Rulings of the Supreme Court:** The BNS2 conforms to some decisions of the Supreme Court. These include omitting adultery as an offence and adding life imprisonment as one of the penalties (in addition to the death penalty) for murder or attempt to murder by a life convict.

## Key Issues and Analysis

- **Age of criminal responsibility is retained at seven years.** It extends to 12 years depending upon the maturity of the accused.

This may contravene recommendations of international conventions.

- The BNS2 defines a child to mean a person below the age of 18. However, for several offences, **the age threshold of the victim for offences against children is not 18.** The threshold for minority of the victim of for rape and gangrape is different.

- Several offences overlap with special laws. In many cases, both carry different penalties or provide for different procedures. This may lead to multiple regulatory regimes, additional costs of compliance and possibility of levelling multiple charges.

- The BNS2 **removes sedition as an offence**. The provision on endangering the sovereignty, unity and integrity of India may have retained aspects of sedition.

- The BNS2 retains the provisions of the IPC on rape and sexual harassment. It **does not consider recommendations of the Justice Verma Committee (2013) such as making the offence of rape gender neutral and including marital rape as an offence.**

- The BNS2 omits S. 377 of IPC which was read down by the Supreme Court. This removes rape of men and bestiality as offences.

## Bharatiya Nagarik Suraksha (Second) Sanhita, 2023 (BNSS2)

- The Bharatiya Nagarik Suraksha (Second) Sanhita, 2023 (BNSS2) seeks to replace the Criminal Procedure Code, 1973 (CrPC). The CrPC provides for the procedure for arrest, prosecution, and bail.

### Key Features

**The CrPC governs the procedural aspects of criminal justice in India. The key features of the Act include:**

- **Separation of offences:** The CrPC classifies offences into two categories: cognisable and non-cognisable. Cognisable offences are those in which the police can arrest and initiate an investigation without a warrant. Non-cognisable offences require a warrant, and in some cases, a complaint by the victim or a third party.

- **Nature of offences:** The CrPC deals with various types of criminal offences, ranging from traffic violations to murder. It distinguishes between bailable and non-bailable offences, specifying the offences for which an accused has the right to bail from police custody.

*The BNSS2 retains most of the provisions of the CrPC. Key changes proposed include:*

- **Detention of under trials:** As per the CrPC, if an accused has spent half of the maximum period of imprisonment in detention, he must be released on personal bond. This does not apply to offences punishable by death. The BNSS2 adds that this provision will also not apply to: (i) offences punishable by life imprisonment, and (ii) persons against whom proceedings are pending in more than one offence.

- **Medical examination:** The CrPC allows medical examination of the accused in certain cases, including rape cases. Such examination is done by a registered medical practitioner on the request of at least a sub-inspector level police officer. The BNSS2 provides that any police officer can request such an examination.

- **Forensic investigation:** The BNSS2 mandates forensic investigation for offences punishable with at least seven years of imprisonment. In such cases, forensic experts will visit crime scenes to collect forensic evidence and record the process on mobile phone or any other electronic device. If a state does not have forensics facility, it shall utilise such facility in another state.

- **Signatures and finger impressions:** The CrPC empowers a Magistrate to order any person to provide specimen signatures or handwriting. The BNSS2 expands this to include finger impressions and voice samples. It allows these samples to be collected from a person who has not been arrested.

- **Timelines for procedures:** The BNSS2 prescribes timelines for various procedures. For instance, it requires medical practitioners who examine rape victims to submit their reports to the investigating officer within seven days. Other specified timelines include: (i) giving judgement within 30 days of completion of arguments (extendable up to 45 days), (ii) informing the victim of progress of investigation within 90 days, and (iii) framing of charges by a sessions court within 60 days from the first hearing on such charges.

- **Hierarchy of Courts:** The CrPC establishes a hierarchy of courts for the adjudication of criminal matters in India. These courts include: (i) Magistrate's Courts: subordinate courts responsible for the trial of most criminal cases, (ii) Sessions Courts: presided over by a Sessions Judge and hear appeals from Magistrate's Courts, (iii) High Courts: have inherent jurisdiction to hear and decide criminal cases and appeals, and (iv) Supreme Court: hear appeals from High Courts and also exercise its original jurisdiction in certain matters. The CrPC empowers the state governments to notify any city or town with a population of more than one million as a metropolitan area. Such areas have Metropolitan Magistrates. The BNSS2 removes the classification of metropolitan areas and Metropolitan Magistrates.

## Key Issues and Analysis

- The BNSS2 allows up to 15 days of police custody, which can be authorised in parts during the initial 40 or 60 days of the 60 or 90 days period of judicial custody. This may lead to denial of bail for the entire period if the police has not exhausted the 15 days custody.

- The power to attach property from proceeds of crime does not have safeguards provided in the Prevention of Money Laundering Act.

- The CrPC provides for bail for an accused who has been detained for half the maximum imprisonment for the offence. The BNSS2 denies this facility for anyone facing multiple charges. As many cases involve charges under multiple sections, this may limit such bail.

- The use of handcuffs is permitted in a range of cases including organised crime, contradicting Supreme Court directions.
- The BNSS2 retains provisions of the CrPC related to maintenance of public order. Since trial procedure and maintenance of public order are distinct functions, the question is whether they should be regulated under the same law or be dealt with separately.
- Recommendations of high-level committees on changes to the CrPC such as reforms in sentencing guidelines and codifying rights of the accused have not been incorporated in the BNSS2.

## Bharatiya Sakshya (Second) Bill, 2023 (BSB2)

- The Bharatiya Sakshya (Second) Bill, 2023 (BSB2) replaces the Indian Evidence Act, 1872 (IEA). It retains most provisions of the IEA including those on confessions, relevancy of facts, and burden of proof.

### Key Features

**The Bharatiya Sakshya (Second) Bill, 2023 (BSB2) retains most of the provisions of the IEA. These include:**

- **Admissible evidence:** Parties involved in a legal proceeding can only present admissible evidence. Admissible evidence can be classified as either 'facts in issue' or 'relevant facts'. Facts in issue refer to any fact that determines the existence, nature, or extent of any right, liability, or disability claimed or denied in a legal proceeding. Relevant facts are facts that are pertinent to a given case. The IEA provides for two kinds of evidence – documentary and oral evidence.
- **A proved fact:** A fact is considered proven when, based on the evidence presented, the Court believes it to either: (i) exist, or (ii) its existence so likely that a prudent man should act as if it exists in circumstances of the case.
- **Police confessions:** Any confession made to a police officer is inadmissible. Confessions made in police custody are also inadmissible, unless recorded by a Magistrate. However, if a fact is discovered as a result of information received from an accused in custody, that information may be admitted if it distinctly relates to the fact discovered.

**Key changes proposed in the BSB2 include:**

- **Documentary evidence:** Under the IEA, a document includes writings, maps, and caricatures. The BSB2 adds that electronic records will also be considered as documents. Documentary evidence includes primary and secondary evidence. Primary evidence includes the original document and its parts, such as electronic records and video recordings. Secondary evidence contains documents and oral accounts that can prove the contents of the original. The BSB2 retains this classification.
- **Oral evidence:** Under the IEA, oral evidence includes statements made before Courts by witnesses in relation to a fact under inquiry. The BSB2 allows oral evidence to be given electronically. This would permit witnesses, accused persons, and victims to testify through electronic means.
- **Admissibility of electronic or digital records as evidence:** Documentary evidence includes information in electronic records that have been printed or stored in optical or magnetic media produced by a computer. Such information may have been stored or processed by a combination of computers or different computers. The BSB2 provides that electronic or digital records will have the same legal effect as paper records. It expands electronic records to include information stored in semiconductor memory or any communication devices (smart phones, laptops). This will also include records on emails, server logs, smart phones, locational evidence and voice mails.
- **Secondary evidence:** The BSB2 expands secondary evidence to include: (i) oral and written admissions, and (ii) the testimony of a person who has examined the document and is skilled to examine the documents.
- **Joint trials:** A joint trial refers to the trial of more than one person for the same offence. The IEA states that in a joint trial, if a confession made by one of the accused which also affects the other accused is proven, it will

be treated as a confession against both. The BSB2 adds an explanation to this provision. It states that a trial of multiple persons, where an accused has absconded or has not responded to an arrest warrant, will be treated as a joint trial.

## Key Issues and Analysis

- The Supreme Court has recognised that electronic records may be tampered with. While the BSB2 provides for the admissibility of such records, there are no safeguards to prevent the tampering and contamination of such records during the investigation process.
- Currently, electronic records must be authenticated by a certificate to be admissible as documents. The BSB2 retains these provisions for admissibility. The BSB2 also classifies electronic evidence as documents

(which may not need certification). This creates a contradiction.

- Under the IEA, a fact discovered due to information received from an accused in police custody may be provable. The BSB2 retains this provision. Courts and Committees have noted that facts may be discovered in police custody by coercion, without adequate safeguards.
- The IEA (and the BSB2) allows such information to be admissible if it was obtained when the accused was in police custody, but not if he was outside. The Law Commission recommended to remove this distinction.
- The Law Commission has made several recommendations, which have not been incorporated. These include the presumption that the police officer caused the injuries if an accused was injured in police custody.

## 1.10    TELECOMMUNICATIONS BILL, 2023

### Context

- Parliament passed the Telecommunications Bill, 2023 to reform the country's century-old telecom law, based on the Indian Telegraph Act, of 1885, the Wireless Telegraphy Act (1933), and the Telegraph Wires (Unlawful Possession) Act (1950).

### Highlights of the Bill

- The Bill seeks to replace the Indian Telegraph Act, 1885 and the Indian Wireless Telegraphy Act, 1933.
- Authorisation will be required from the central government to: (i) establish and operate telecommunications networks, (ii) provide telecommunications services, or (iii) possess radio equipment.
- Spectrum will be allocated through auction, except for specified entities and purposes for which it will be assigned administratively.
- Telecommunication may be intercepted on specified grounds including security of the state, public order, or prevention of offences. Telecom services may be suspended on similar grounds.

- The Bill provides a mechanism to exercise the right of way for laying telecom infrastructure in public as well as private property.
- The central government may provide for measures to protect users such as requiring prior consent to receive specified messages, and creation of a do not disturb register.

### Key Features

- **Authorisation for telecom-related activities:** Prior authorisation from the central government will be required to: (i) provide telecommunication services, (ii) establish, operate, maintain, or expand telecommunications networks, or (iii) possess radio equipment. Existing licences will continue to be valid for the period of their grant, or for five years, where the period is not specified.
- **Assignment of spectrum:** Spectrum will be assigned by auction, except for specified uses, where it will be allocated on an administrative basis. Specified purposes include: (i) national security and defence, (ii) disaster management, (iii) weather forecasting, (iv) transport, (v) satellite services such as DTH

and satellite telephony, and (vi) BSNL, MTNL, and public broadcasting services. The central government may re-purpose or re-assign any frequency range. The central government may permit sharing, trading, leasing, and surrender of spectrum.

- **Powers of interception and search:** Messages or a class of messages between two or more persons may be intercepted, monitored, or blocked on certain grounds. Such actions must be necessary or expedient in the interest of public safety or public emergency, and must be in the interest of specified grounds which include: (i) security of the state, (ii) prevention of incitement of offences, or (iii) public order. These actions will be subject to procedure, safeguards, and duration as may be prescribed. Telecom services may be suspended on similar grounds. The government may take temporary possession of any telecom infrastructure, network, or services on occurrence of any public emergency or public safety. An officer authorised by the government may search premises or vehicles for possession of unauthorised telecom network or equipment.

- **Protection of users:** The central government may provide for measures to protect users which include: (i) prior consent to receive specified messages such as advertising messages, (ii) creation of Do Not Disturb registers, and (iii) a mechanism to allow users to report malware or specified messages. Entities providing telecom services must establish an online mechanism for registration and redressal of grievances.

- **Right of way:** Entities laying telecommunication infrastructure may seek right of way over public or private property. Right of way must be provided on a non-discriminatory and non-exclusive basis to the extent possible.

- **Appointments to TRAI:** The Bill amends the TRAI Act to also allow individuals with: (i) at least 30 years of professional experience to serve as the Chairperson, and (ii) at least 25 years of professional experience to serve as members.

- **Digital Bharat Nidhi:** The Universal Service Obligation Fund has been established under the Indian Telegraph Act, 1885 to provide for telecom services in underserved areas. The Bill retains this provision, renames the fund as Digital Bharat Nidhi, and also allows its use for research and development in telecom.

- **Offences and penalties:** The Bill specifies various criminal and civil offences. Providing telecom services without authorisation, or gaining unauthorised access to a telecom network or data, are punishable with imprisonment up to three years, a fine up to two crore rupees, or both. Breaching terms and conditions of authorisation is punishable with a civil penalty of up to five crore rupees. Possessing unauthorised equipment, or using unauthorised network or service, is punishable with a penalty of up to ten lakh rupees.

- **Adjudication process:** The central government will appoint an adjudicating officer to conduct inquiries and pass orders against civil offences under the Bill. The officer must be of the rank of joint secretary and above. Orders of the adjudicating officer may be appealed before the Designated Appeals Committee within 30 days. Members of this Committee will be officers of the rank of at least Additional Secretary. Appeals against the orders of the Committee, in connection to breach of terms and conditions, may be filed with TDSAT within 30 days.

## Key Issues and Analysis

- The Bill provides that procedures and safeguards related to interception will be prescribed by the central government. The question is whether these should be provided by the Bill.

- The Bill may allow mass surveillance; such measures may violate the fundamental right to privacy on the account of proportionality.

- The Bill does not specify procedural safeguards concerning powers to search premises and vehicles.
- The requirement of biometric verification for users may not be proportionate and hence, may infringe upon the fundamental right to privacy.
- Telecommunication services, as defined under the Bill, may cover internet-based services.
- The Bill vests several regulatory functions with the central government. This is distinct from sectors such as power and finance, where these functions have been delegated to the regulators.
- The government may add, modify or remove offences in the Third Schedule to the Bill by a notification. The question is whether such changes should only be through an Act of Parliament.

**Biggest impact the Telecom Bill 2023 will have on the common men**

1. Obtaining a SIM or other telecom resources through fraud, personation, or cheating, will result in a jail term of up to three years and a fine of ₹50 lakh.
2. The new Telecom bill has a provision for crimes related to spoofing or cloning of SIM cards. Reliance Jio, Bharti Airtel, and Vodafone Idea have warned their subscribers against the cloning of SIM cards.
3. Consent of mobile users will be required for receiving advertising/promotional messages under this bill.
4. The press messages of correspondents accredited to the Centre or state governments will not be intercepted or detained unless their transmission has been prohibited under rules applicable to public emergency and public order.
5. Under the Telecommunications Bill, 2023, the telecom operators have been mandated to capture verifiable biometrics data when they issue a new connection.

## 1.11    FAME INDIA PHASE II

**Context**
- The Union government has incentivized the sale of 11,53,079 electric vehicles (EVs) with subsidies amounting to Rs 5,228 crore under the second phase of the Faster Adoption and Manufacturing of Electric Vehicles (FAME II) scheme.

**FAME India Phase I**

| Aspect | Details |
| --- | --- |
| Full Form | Faster Adoption and Manufacturing of (Hybrid &) Electric Vehicles in India (FAME India) Phase I |
| Launch Date | April 1, 2015 |
| Objective | Encourage the adoption of electric and hybrid vehicles to address issues like air quality, energy security, and climate change. |
| Duration | Initial phase planned for two years, from 2015 to 2017. Subsequently extended with modifications. |
| Incentives for EV Buyers | Financial incentives for buyers of electric two-wheelers, three-wheelers, and four-wheelers. |
| | Subsidies to reduce the upfront cost of electric vehicles. |
| Charging Infrastructure | Support for creating charging infrastructure in urban areas. |
| | Incentives for the establishment of charging stations. |

| Research & Development | Funding allocated for research and development in electric vehicle technologies. |
|---|---|
| Budget Allocation | The initial outlay for FAME India Phase I was ₹795 crores. The program was later extended and received additional funding. |
| Incentive Period | Initially planned for two years, but it was extended beyond 2017 with modifications. |
| Impact | Encouraged the adoption of electric vehicles in various segments. |
| | Contributed to the development of the electric vehicle ecosystem in India. |
| Challenges and Criticisms | Challenges in establishing a robust charging infrastructure network. |
| | Concerns regarding the actual impact on reducing vehicular emissions. |
| Future Iterations | Evolved into FAME India Phase II with a broader scope and continued objectives. |

## FAME India Phase II

| Aspect | Details |
|---|---|
| Full Form | Faster Adoption and Manufacturing of Hybrid and Electric Vehicles in India (FAME India) Phase II |
| Initiation Date | FAME India Phase II was launched on April 1, 2019. |
| Objective | To promote the adoption of electric and hybrid vehicles, enhance charging infrastructure, and incentivize electric mobility in India. |
| Duration | The initial phase of FAME India Phase II was planned for a period of three years, ending in March 2022. |
| Key Components | **Incentives for Electric Vehicles (EVs):** Subsidies and incentives for the purchase of electric vehicles. |
| | **Charging Infrastructure:** Development of public charging stations to support electric vehicle charging. |
| | **Promotion of EV Manufacturing:** Encouraging the manufacturing of electric vehicles and their components in India. |
| | **Technology Development and Innovation:** Support for research and development in electric vehicle technologies. |
| Incentives for EV Buyers | Direct financial incentives for buyers of electric two-wheelers, three-wheelers, and four-wheelers. |
| | Incentives for electric buses for various stakeholders, including state/city transport undertakings. |
| Charging Infrastructure | Promoting the installation of charging infrastructure with a focus on cities, highways, and public parking spaces. |
| | Financial support for the development of charging stations. |
| EV Adoption Targets | Setting targets for electric vehicle sales and adoption to encourage the transition from conventional to electric vehicles. |
| Budget Allocation | The government allocated a budget of ₹10,000 crores for the implementation of FAME India Phase II. |
| Monitoring and Review | Regular monitoring and reviews to assess the progress and effectiveness of the program. |
| Impact | Encouraged the adoption of electric vehicles in various segments. |
| | Contributed to the development of the electric vehicle ecosystem in India. |
| Challenges and Criticisms | Challenges in establishing an extensive charging infrastructure network. |

| | |
|---|---|
| | Funding limitations and the need for sustained financial support. |
| Future Prospects | Continued efforts to promote electric mobility and address challenges in infrastructure and manufacturing. |

## 1.12    MISSION KARMAYOGI

### Context
- On the occasion of Good Governance Day, Union Minister Dr Jitendra Singh launched the Extended Version of Mission Karmayogi.

### Mission Karmayogi

#### Details

**Launch Date**
- September 2, 2020

**Objective**
- Transform the Human Resource Management (HRM) landscape of the government.
- Build a future-ready and citizen-centric civil service.

**Implementing Authority**
- Department of Personnel and Training (DoPT), Government of India.

**Components**
- National Program for Civil Services Capacity Building (NPCSCB).
- Karmayogi Platform: An integrated digital platform for learning and development.

**Key Features**
- Focus on competency-based learning.
- Encourages self-motivated learning and development.
- Individualized and continuous learning opportunities for civil servants.

**National Program for Civil Services Capacity Building (NPCSCB)**
- Aims at building a common understanding and shared knowledge across departments.
- Emphasizes on improving core competencies and leadership skills.

**Karmayogi Platform**
- A digital platform for learning and development.
- Offers a wide range of courses from various national and international institutions.
- Enables civil servants to access training modules anytime, anywhere.

**Focus Areas**
- Leadership and management.
- Technology and innovation.
- Ethics and accountability.

**Benefits**
- Enhanced skill sets and competencies among civil servants.
- Improved efficiency and effectiveness in public service delivery.

**Challenges**
- Adapting to new learning methodologies.
- Ensuring widespread participation and engagement.

**Significance**
- Represents a paradigm shift in the training and development approach for civil servants, fostering a culture of continuous learning and adaptability.

### Details of new features launched on the Mission Karmayogi platform
- **My iGOT** delivers targeted training courses on home page of individual officer that directly address the unique capacity-building needs of the officer as identified in the Capacity-Building Plan for their Ministries/Departments thereby facilitating a highly personalized, focused and targeted capacity-building experience thereby ensuring a perfect fit between the individual and organizational learning needs. More than 28 lakh users have on boarded the platform till now with about 830 high quality e-learning courses being made available on the platform.

- **Blended Programs** on the iGOT-Karmayogi platform will facilitate equitable access to training methodologies across all levels to meet the dynamic training needs of the officials. Blended Programs integrate traditional offline (in-person) classroom courses with online learning components. It enables officers and faculty to leverage the flexibility and convenience of online courses while retaining the invaluable benefits of face-to-face classroom interactions.

- **Curated Programs** on iGOTKarmayogi are designed to cater to the diverse learning needs of the Ministries/Departments and Training Institutions. The Course Providers will be able to curate relevant content, resources, and assessments from the repository of iGOT with a Programmatic approach to provide a tailored learning journey.

- **12 domain-specific capacity-building e-learning courses** have been developed in a span of two months as part of Annual Capacity Building Plan (ACBP) of the DOPT by Karmayogi Digital Learning Lab (KDLL) of DoPT. KDLL was inaugurated by Dr Jitendra Singh in August 2021 to develop e-learning courses to build the capacity of civil servants. The annual Capacity Building Plan for DoPT was launched on 27th Sept. 2023 by Dr Jitendra Singh. These 12 courses will not only directly address the domain competency requirements of the Civil Servants working in DoPT, but also help other Government organizations in handling functional matters on a day-to-day basis in an effective manner.

- **VIKAS (Variable & Immersive Karmayogi Advanced Support)** is a new blended learning program meant for capacity building of Middle management civil servants in the Central Secretariat. VIKAS is a blended program with iGOT consisting of 33 hours complemented by 30 hours of offline training at ISTM with focuses on the development of functional, behavioral and technological competencies required in Central Government.

## 1.13 APPLICATION OF ARTIFICIAL INTELLIGENCE (AI) IN THE JUDICIARY

### Context

- The Supreme Court has deployed SUVAS, a machine-assisted translation tool trained by Artificial Intelligence, in order to promote regional languages in judicial procedure.

*Note: Read about SUVAS in short news articles*

### AI in Judiciary

- In India, the application of Artificial Intelligence (AI) in the judiciary is gradually gaining momentum, promising increased efficiency and effectiveness in legal processes. Several initiatives and applications are being explored to leverage AI technologies in the Indian judiciary:

**Legal Research and Case Analysis:**

- AI tools are utilized to enhance legal research by efficiently sorting through vast databases of case law, statutes, and legal literature. This aids legal professionals in identifying relevant precedents and legal arguments swiftly.

**Document Review and Due Diligence:**

- AI is employed to automate the review and analysis of legal documents, contracts, and evidence, streamlining due diligence processes. This can significantly reduce the time and effort required for document scrutiny.

**Predictive Analytics for Case Management:**

- Machine learning algorithms are being employed to predict case outcomes based on historical data. This assists judges in managing their caseloads effectively and facilitates informed decision-making.

**E-Courts and Case Management Systems:**

- Several Indian courts are adopting technology-driven case management systems to automate administrative tasks, manage case files, and streamline court proceedings. E-courts initiatives aim to digitize legal processes for greater accessibility and efficiency.

**Virtual Courts and Online Dispute Resolution (ODR):**

- The COVID-19 pandemic has accelerated the adoption of virtual courts in India. AI-powered ODR platforms are being explored

to resolve disputes online, making the legal process more accessible and time-efficient.

## Legal Chatbots for Public Assistance:

- Legal chatbots are being developed to provide preliminary legal assistance to the public. These AI-driven chatbots can answer common legal queries, guide individuals through legal procedures, and enhance public legal awareness.

## Automated Legal Writing:

- AI is being used to assist lawyers and legal professionals in drafting legal documents, contracts, and legal opinions. Automated legal writing tools analyze the context and generate draft documents, saving time and reducing errors.

## Judicial Data Analysis:

- AI can analyze judicial data to identify patterns, trends, and potential areas for improvement in the legal system. This data-driven approach aids in policy-making and enhancing the overall efficiency of the judiciary.

## Language Processing and Translation Services:

- AI-driven language processing tools are employed to assist in the interpretation of legal texts and documents. Additionally, translation services powered by AI facilitate the handling of cases involving multiple languages.

## Biometric Authentication in Legal Processes:

- Biometric authentication systems are being explored for secure access to legal documents and information. This enhances data security and ensures authorized access to sensitive legal materials.

## Closing Remarks

- While these applications hold great promise, the integration of AI in the Indian judiciary is not without challenges. Addressing issues of data security, ethical considerations, and ensuring that AI systems do not perpetuate biases are critical aspects that need attention. The judiciary and legal institutions in India are gradually adapting to these technological advancements, aiming to strike a balance between innovation and the preservation of legal principles.

## 1.14    REVOCATION OF ARTICLE 370

## Context

- In the 16-day hearing, the Supreme Court heard arguments that the constitutional promise in Article 370 is premised on three basic guarantees — asymmetric federalism, autonomy, and consent of the people of J&K, represented through its legislature.

## Article 370

- Article 370 of the Indian Constitution, as it existed before its revocation in August 2019, granted special autonomy to the region of Jammu and Kashmir. Here are the key details related to Article 370:

## Historical Context

## Instrument of Accession:

- Article 370 was a temporary provision included in the Indian Constitution to recognize the special circumstances under which the princely state of Jammu and Kashmir acceded to India in 1947.

## Autonomy Assured:

- Under the terms of the Instrument of Accession, Jammu and Kashmir retained significant autonomy over its internal affairs, except for matters related to defense, communications, and foreign affairs.

## Key Provisions of Article 370

## Temporary Provision:

- Article 370 was explicitly described as a "temporary provision" in the Constitution. It allowed the state of Jammu and Kashmir to have its own constitution and decision-making powers, with limited involvement from the Indian Parliament.

## Autonomy on Certain Matters:

- Jammu and Kashmir had the authority to have its own constitution, flag, and autonomy over internal matters. The state could have its own laws, except in areas specified in the Instrument of Accession.

### Limited Application of Indian Laws:

- Indian laws were not automatically applicable in Jammu and Kashmir. The state had the power to determine which Indian laws would be applicable in its territory.

### Special Status:

- The special status provided by Article 370 was reflected in the autonomy enjoyed by Jammu and Kashmir, making it distinct from other states within the Indian Union.

## Amendments to Article 370

### Presidential Orders:

- Over the years, several presidential orders were issued to modify the applicability of various provisions of the Indian Constitution to Jammu and Kashmir. These orders were often used to extend specific provisions of the Constitution to the state.

### Erosion of Autonomy:

- Despite the initial special status, over time, various provisions of the Indian Constitution were extended to Jammu and Kashmir through these presidential orders, leading to a gradual erosion of its autonomy.

## Revocation of Article 370

### Presidential Order in 2019:

- On August 5, 2019, the Government of India, through a presidential order, abrogated the special status of Jammu and Kashmir by revoking Article 370 and bifurcated the state into two Union Territories – Jammu & Kashmir and Ladakh.

### Parliamentary Approval:

- The move to revoke Article 370 was accompanied by a resolution passed in both houses of Parliament, and a subsequent bill was enacted to reorganize the state into two Union Territories.

### Constitutional Amendment:

- The revocation involved a constitutional amendment, and the special provisions granted by Article 370 were effectively nullified.

## Revocation: Pros

### Integration with the Rest of India:

- The revocation aimed at integrating Jammu and Kashmir more closely with the rest of India, removing the special status that treated the region differently from other states.

### Extension of Central Laws:

- After the revocation, central laws and provisions that were not applicable to Jammu and Kashmir earlier could be extended to the region, ensuring uniformity in laws across the country.

### Economic Development:

- The move was expected to pave the way for increased economic development and investments in Jammu and Kashmir, as the region could now benefit from national-level policies and programs.

### Abolition of Dual Citizenship:

- The revocation ended the concept of dual citizenship, bringing residents of Jammu and Kashmir under a single national citizenship.

### Constitutional Integration:

- The primary rationale behind the revocation was to integrate Jammu and Kashmir constitutionally with the rest of India, emphasizing the need for a uniform constitutional framework across the country.

## Revocation: Cons

### Loss of Special Autonomy:

- Critics argue that the revocation resulted in the loss of special autonomy for Jammu and Kashmir, diluting the unique identity and privileges enjoyed by the region.

### Unrest and Security Concerns:

- The move led to heightened tensions, security concerns, and restrictions, especially in the initial phase after the revocation, contributing to unrest in the region.

### Communication Shutdown:

- To manage potential unrest, there was a significant communication shutdown, including internet and phone services, which drew criticism for impeding basic freedoms.

### Doubts on Legality:

- Some critics questioned the constitutional legality of the revocation, arguing that the special status granted by Article 370 could not be unilaterally altered without proper constitutional processes.

## Rationale

### National Integration:

- The primary rationale was to foster national integration by treating Jammu and Kashmir on par with other states in India, eliminating the special privileges it held.

### Addressing Regional Disparities:

- The move aimed to address the perceived regional disparities and promote economic development by applying national policies and schemes uniformly.

### Security Concerns:

- The security rationale emphasized the need to have a more direct control and presence in the region to better address security challenges.

### Ensuring Equal Rights:

- Proponents argued that the revocation aimed to ensure that residents of Jammu and Kashmir enjoyed the same rights and opportunities as citizens in other parts of the country.

## Way Ahead

### Political Dialogue:

- Initiating a sustained political dialogue to address the concerns and aspirations of the people of Jammu and Kashmir is crucial for long-term stability and harmony.

### Economic Development:

- Prioritizing and implementing measures for economic development in the region to fulfill the promises of prosperity and growth.

### Human Rights:

- Ensuring the protection of human rights and civil liberties, and addressing any instances of human rights violations, is essential to building trust and confidence.

### Inclusive Governance:

- Promoting inclusive governance and involving local representatives in decision-making processes can contribute to a more representative and participatory system.

### International Engagement:

- Engaging diplomatically at the international level to address concerns and garner support for the region's stability.

## 1.15   SHORT ARTICLES

# Advocates Amendment Bill, 2023

### Context

- The Advocates Amendment Bill, 2023, was passed in the Lok Sabha.

### Details

- It amends **the Advocates Act, of 1961**. The Bill repeals certain sections related to touts under the Legal Practitioners Act, 1879. The 1961 Act consolidates the law related to legal practitioners and constitutes Bar Councils and the All-India Bar. Key features of the Bill include:
- **Touts:** The Bill provides that every High Court, district judge, sessions judge, district magistrate, and revenue officer (not below the rank of a district collector) may frame and publish lists of touts. Tout refers to a person who: (i)either proposes to procure or procures the employment of a legal practitioner in a legal business in return of any payment, or (iii) frequents places such as the precincts of civil or criminal courts, revenue-offices, or railway stations to procure such employment. The Court or judge may exclude from the premises of the Court any person whose name is included in the list of touts.

- **Preparation of lists:** The authorities empowered to frame and publish the list of touts may order subordinate courts to hold an inquiry into the conduct of persons alleged or suspected to be touts. Once such a person is proven to be a tout, his name may be included by the authority in the list of touts. No person will be included in such lists without

getting an opportunity of showing cause against his inclusion.

- **Penalty:** Any person who acts as a tout while his name is included in the list of touts will be punished with imprisonment up to three months, a fine up to Rs 500, or both.

# Pradhan Mantri Bharatiya Janaushadhi Pariyojana (PMBJP)

## Context

- Over 35 crore Jan Aushadhi Suvidha Sanitary Pads have been sold through the Pradhan Mantri Bhartiya Janaushadhi Pariyojana centres.

## PMBJP

### About

- Pradhan Mantri Bharatiya Janaushadhi Pariyojana (PMBJP) is a campaign–public welfare scheme.

### Launch

- It was **launched by the Government in 2008** and later <u>re-launched in the year 2015.</u>

### Department

- It was **launched by the Department of Pharmaceuticals** to <u>provide quality medicines at affordable prices to the masses</u> through special kendras known as Pradhan Mantri Bharatiya Janaushadhi Pariyojana Kendra (PMBJK).

### Mandate

- The scheme's centres have been set up to provide generic drugs, which are available at lesser prices but are equivalent in quality and efficacy as expensive branded drugs.

### Role of BPPI

- Bureau of Pharma Public Sector Undertakings of India (BPPI) has been established under the Department of Pharmaceuticals, with the support of all the CPSUs for co-ordinating procurement, supply and marketing of generic drugs through the centres.

# Panchayat Development Index (PDI)

## Context

- Ministry of Panchayati Raj has released a report on Panchayat Development Index (PDI).

## Panchayat Development Index (PDI)

### About

- The Panchayat Development Index (PDI) is a multi-domain and multi-sectoral index that is intended to be used to assess the overall holistic development, performance & progress of panchayats.

### Indicators and Parameters

- The Panchayat Development Index takes into account various socio-economic indicators and parameters to gauge the well-being and development status of the local communities within the jurisdiction of a panchayat. The index typically considers factors such as:
- **Infrastructure :** Availability of basic amenities like roads, electricity, water supply, sanitation facilities, etc.
- **Health and Education :** Access to healthcare services, educational institutions, literacy rates, and enrolment in schools.
- **Economic Indicators :** Income levels, employment opportunities, agricultural productivity, and economic activities.
- **Social Indicators :** Poverty rates, gender equality, social inclusion, and overall quality of life.
- **Governance and Administration :** Efficiency and transparency of local governance, delivery of public services and citizen participation.
- **Environmental Sustainability :** Measures related to ecological balance, conservation, and sustainable practices.

*Note: The specific indicators and weights used in calculating the Panchayat Development Index can vary based on the goals and priorities of the governing body or organization that develops and utilizes the index.*

### Significance

- The Panchayat Development Index shall provide public representatives, policy-makers,

government agencies, and local authorities with valuable insights into the areas that require attention for improvement within the rural areas under the jurisdiction of the panchayats.

- It helps in identifying disparities, achievement of development goals, and formulating targeted policies and interventions to enhance the overall well-being and quality of life of rural communities.

# Terms of Reference for the Sixteenth Finance Commission

## Context

- The Union Cabinet chaired by the Prime Minister; Shri Narendra Modi has approved the Terms of Reference for the Sixteenth Finance Commission.

## Terms of Reference

- Terms of Reference show how the object in question will be defined, developed, and verified.

## Constitutional Provision

- Article 280(1) of the Constitution lays down the modalities for setting up of a Finance Commission to make recommendation on the distribution of net proceeds of taxes between the Union and the States, the allocation between the States of respective shares of such proceeds; grants- in-aid and the revenues of the States and measures needed to supplement the resources of the Panchayats during the award period.

## Fifteenth Finance Commission

- The Fifteenth Finance Commission was constituted on November 27, 2017.
- It made recommendations covering the period of six years commencing on 1st April 2020 through its Interim and Final Reports. The recommendations of the Fifteenth Finance Commission are valid up to the financial year 2025-26.

## Terms of Reference for the Sixteenth Finance Commission:

**The Finance Commission shall make recommendations as to the following matters, namely:**

- The distribution between the Union and the States of the net proceeds of taxes which are to be, or maybe, divided between them under Chapter I, Part XII of the Constitution and the allocation between the States of the respective shares of such proceeds;
- The principles which should govern the grants-in-aid of the revenues of the States out of the Consolidated Fund of India and the sums to be paid to the States by way of grants-in-aid of their revenues under Article 275 of the Constitution for purposes other than those specified in the provisos to clause (1) of that article; and
- The measures needed to augment the Consolidated Fund of a State to supplement the resources of the Panchayats and Municipalities in the State based on the recommendations made by the Finance Commission of the State.
- The Commission may review the present arrangements on financing Disaster Management initiatives, concerning the funds constituted under the Disaster Management Act, 2005 (53 of 2005), and make appropriate recommendations thereon.

# Aspirational Districts Programme

## Context

- Of the 112 aspirational districts identified by the government, 26 are spread across the four states — Madhya Pradesh, Chhattisgarh, Rajasthan, and Telangana.

## Aspirational Districts Programme

- The Aspirational Districts Programme is an initiative by the Government of India implemented by NITI Aayog with the help of various stakeholders to improve the living standards of people in aspirational districts.
- The Aspirational Districts Programme(ADP) was launched in January 2018 by Prime Minister of India Narendra Modi.
- The programme is anchored by NITI Aayog in partnership with state governments and district-level administrations.

## Key Areas of Focus

- Health & Nutrition

- Education
- Agriculture & Water Resources
- Financial Inclusion & Skill Development
- Basic Infrastructure

# Jammu and Kashmir Reorganisation (Amendment) Bill, 2023

## Context

- The Lok Sabha passed the Jammu and Kashmir Reorganisation (Amendment) Bill, 2023.

## Jammu and Kashmir Reorganisation (Amendment) Bill, 2023

- The Jammu and Kashmir Reorganisation (Amendment) Bill, 2023 was introduced in Lok Sabha on July 26, 2023. The Bill amends the Jammu and Kashmir Reorganisation Act, 2019. The Act provides for the reorganization of the state of Jammu and Kashmir into the union territories of Jammu and Kashmir (with legislature) and Ladakh (without legislature).

## Number of seats in the Legislative Assembly:

- The Second Schedule of the Representation of the People Act, 1950 provides for the number of seats in legislative assemblies. The 2019 Act amended the Second Schedule of the 1950 Act to specify the total number of seats in the Jammu and Kashmir Legislative Assembly to be 83. It reserved six seats for Scheduled Castes. No seats were reserved for Scheduled Tribes. The Bill increases the total number of seats to 90. It also reserves seven seats for Scheduled Castes and nine seats for Scheduled Tribes.

## Nomination of Kashmiri migrants:

- The Bill adds that the Lieutenant Governor may nominate up to two members from the Kashmiri migrant community to the Legislative Assembly. One of the nominated members must be a woman. Migrants are defined as persons who migrated from the Kashmir Valley or any other part of the state of Jammu and Kashmir after November 1, 1989, and are registered with the Relief Commissioner. Migrants also include

individuals who have not been registered due to: (i) being in government service in any moving office, (ii) having left for work, or (iii) possessing immovable property at the place from where they migrated but are unable to reside there due to disturbed conditions.

## Nomination of displaced persons:

- The Bill adds that the Lieutenant Governor may nominate to the Legislative Assembly one member representing displaced persons from Pakistan-occupied Jammu and Kashmir. Displaced persons refer to individuals who left or were displaced from their place of residence in Pakistani-occupied Jammu and Kashmir and continue to reside outside such place. Such displacement should have taken place in 1947-48, 1965, or 1971 due to civil disturbances or fear of such disturbances. These include successors-in-interest of such persons.

# MLAs Local Area Development Scheme

## Context

- The government announced it would double the funds available to each legislator under the MLA Local Area Development (MLALAD) Scheme.

## MLAs Local Are Development Scheme

- The government had introduced **MLAs Local Area Development Scheme from 2000-01** making MLAs able to recommend small development works of capital nature.
- Under the scheme, each MLA has the choice to suggest to the Deputy Commissioner of his/her district, to the extent of allocations given from year to year, to be taken up his/her constituency.
- Each MLA is sanctioned **MLALAD fund of Rs.2 crore per annum for their respective constituency by the central government.**

## Important Features

- The type of work under this scheme should be developmental in nature.
- The work should be such that it can be completed within one financial year and lead to the creation of durable assets.

- A minimum of 10% of funds allocated should be utilized for capacity building and training of unemployed youth in the state.
- The work to be taken under MLALADS should not be under Rs. 1 lakh in each case.

## Works that may be taken up under MLALADS

- Construction for buildings for schools, hostels, libraries and other buildings of educational institutions belonging to the government.
- Construction of village roads, bridges, public irrigation channels and public drainage schemes.
- Providing drinking water to the people in the area by digging tube wells or other works that may help in this respect.
- Construction of public health care buildings, public toilets and bathrooms, footpaths, pathways and foot bridges.
- Construction of common gobar plants, non-conventional energy systems/devices for community use.
- Bus Sheds/Stops for public transport passengers.
- Social forestry, farm forestry, horticulture, parks and gardens in government and community land.

# National Company Law Appellate Tribunal (NCLAT)

### Context

- The National Company Law Appellate Tribunal (NCLAT) has refused to stay the proposed merger between Zee Entertainment Enterprises Ltd (ZEEL) and Sony.

### About National Company Law Appellate Tribunal (NCLAT)

- The National Company Law Appellate Tribunal (NCLAT) is **a tribunal which was formed under Section 410 of the Companies Act, 2013.**
- The tribunal is responsible for hearing appeals from the orders of the National Company Law Tribunal(s) (NCLT), starting on 1 June 2016.
- The tribunal also hears appeals from orders issued by the Insolvency and Bankruptcy Board of India.

- It also hears appeals from any direction issued, decision made, or order passed by the Competition Commission of India (CCI) and the National Financial Reporting Authority (NFRA).
- The decisions of National Company Law Appellate Tribunal are **appealable in Supreme Court of India.**

### Structure of NCLAT

- The NCLAT includes a chairperson, 3 judicial members, and 2 technical members. It consists of a total of not more than eleven members. Ashok Bhushan, retired judge of Supreme Court is the current chairman of National Company Law Appellate Tribunal.

### Qualifications for Judicial member at National Company Law Appellate Tribunal:

- Should be of 50 years old.
- Served at least 5 years as District Judge or High Court Judge or has a minimum 10 years of experience serving in any judicial authority.

### Qualifications for Technical member at National Company Law Appellate Tribunal:

- Should be of 50 years old.
- Any person practicing as a chartered Accountant, cost accountant or company secretary for a period of 15 years.
- Any person holding the rank of Secretary or Additional Secretary to the central government and is a member of the Indian Corporate Law Service or Indian Legal Service for more than 15 years.

### Powers and functions

- Appellate Tribunal to hear and dispose of appeals against any direction issued or decision made or order passed by the:
  o Competition Commission of India (CCI).
  o Insolvency and Bankruptcy Board of India.

# Ex-parte Decree

### Context

- The Supreme Court in the case Koushik Mutually Aided Cooperative Housing Society V. Ameena Begum observed and has held that the Civil Revision Petition moved under Section 115 of the Code of Civil Procedure,

1908, CPC is not maintainable against the dismissal of an application filed to set aside an ex-parte decree under Order IX Rule 13 of the CPC.

## Background

- Every court proceeding commences with the appearance of both the parties or their legal representatives.
- The parties need to appear before the judge, otherwise, the parties might face adverse effects from their non-appearance.
- Order 9 of the Code of Civil Procedure, 1908 (CPC) deals with the appearance and non-appearance of the party.

## Ex-parte decree

- Despite service of summons, on the date of hearing only plaintiff does and defendant does not appear in the court to hear the suit, hence court passes ex-parte decree against the defendant. The legal validity of such a decree is similar to any bi-party decree.
- Code of Civil Procedure 1908, analyses various provisions of ex-parte decree i.e. one sided decision. Part I of the Code, talks about nature and cause of ex-parte decree. Part II deals with relief against ex-parte decree, Part III deals with sufficient cause for non-appearance and Part IV deals with remedies available against ex parte decree obtained by fraud.

## Order 9 Rule 6(1) (a) states that:

- Where the plaintiff appears but defendant does not appear:
  i.) When summon is duly served
- Court may pass an order that suit shall be heard ex-parte
  ii.) When summon not served
- Court may order second summon
  iii.) Summon served but not in due time
- If the summon is served after the date of hearing is already passed

## Consequences of non-appearance:

- General rule says that both Parties shall be heard and proceedings shall not be at the disadvantage of the other Party

### Rule 1:

- Parties shall be present on the date of hearing by their respective pleaders and suit shall be

heard unless adjourned by the court for the next date

### Rule 2:

- Dismissal of suit when summon not served because of Plaintiff's fault of not paying the court fee, court may dismiss such case.

### Rule3:

- When neither party appears in the court for hearing the suit is dismissed

### Rule 4:

- Plaintiff may bring a fresh suit under Rule 2 or 3 and the court allows it thinking that there was a sufficient cause of failure to deliver the summons.

### Rule 5:

- When a summons has been issued to the defendant and returned undeliverable, the plaintiff has one month from the date of the return to the court to apply for the issuance of a new summons. If the plaintiff fails to do so, the court will order that the suit be dismissed as against that defendant unless the plaintiff proves to the satisfaction of the court within the one-month period that:
  1. He has failed after hi best efforts to find the residence of defendant
  2. Defendant is avoiding the process/summons
  3. There is any other sufficient cause for extending the time

### Rule 6:

- It is only when the plaintiff appears in the court

### Rule 7:

- When the defendant appears on the adjournment date the court asks the court if it feels the excuse given by the defendant can be admitted and can be heard.

### Rule 8:

- Court orders the dismissal of the suit

### Rule 9:

- Defendant may apply for the dismissal order aside and court is satisfied that there is sufficient cause for his non appearance court may set aside the dismissal order

**Rule 10:**

- Suit will be proceeded if there are 2 or more plaintiffs and just one defendant is not appearing

**Rule 11:**

- Suit will be proceeded if there are 2 or more defendants and just one defendant is not appearing

**Rule 12:**

- Plaintiff or defendant will be governed by the above rules if court is satisfied that the excuse given by them is satisfactory.

# Rail Kaushal Vikas Yojana (RKVY)

## Context

- Over 26,000 candidates, who have been skilled till November 2023 under the "Rail Kaushal Vikas Yojana", will not have any preference in jobs in the Indian Railways, Railway Minister Ashwini Vaishnaw informed the Rajya Sabha.

## Rail Kaushal Vikas Yojana (RKVY)

- As part of Azadi ka Amrit Mahotsav, the Ministry of Railways introduced Rail Kaushal Vikas Yojana (RKVY) **under the aegis of the Pradhan Mantri Kaushal Vikas Yojana** to train youths in vocational skills.
- The Rail Kaushal Vikas Yojana's **primary goal is to give kids in the nation technical training. so that the state's kids can get the skills necessary to find work.**
- This **skill-training program will be business-based**.
- The young of the nation will get more skills and independence as a result of this program.

## Eligibility

- Candidates **must be between the ages of 18 and 35 and have completed high school (class 10).**

## Procedure for Selection

- Candidates for the program will be chosen from applications filed online.
- Candidates will be shortlisted from among these applicants depending on their matriculation marks.

## Curriculum

- The curriculum created for this plan was created by Banaras Locomotive Works.
- The trainees will be subjected to a standardized examination.
- The National Rail and Transportation Institute will grant them a certificate upon completion of their program.
- Additionally, trainees will be given toolkits to assist them in applying their learnings and improve their capacity for self-employment as well as employability in other industries.

## Significance

- With the Rail Kaushal Vikas Yojana in action, the unemployment rate in the nation would also go down.
- Under this program, skill training will be offered without charge.
- Additionally, this plan will show promise in raising the country's residents' level of living.
- In addition to this, the nation's kids will also participate in the process of nation-building.

# Committee on Subordinate Legislation

## Context

- The Subordinate Legislation Committee of Rajya Sabha, has pulled up the Union government for the delay in framing of rules/regulations for the Acts passed by Parliament.

## Committee on Subordinate Legislation

- The most effective control that Lok Sabha exercises over subordinate legislation is through its scrutiny Committee the "Committee on Subordinate Legislation.
- For the first time the Committee **was constituted in December, 1953** and has been constituted since then from year to year.
- The functioning of the Committee on Subordinate Legislation, Lok Sabha is largely governed by the Rules 317 - 322 of Rules of Procedure and

## Functions

- The functions of the Committee on Subordinate Legislation are to scrutinize and report to the House whether the powers to

make regulations, rules, sub-rules, bye-laws etc. conferred by the Constitution or delegated by Parliament are being properly exercised within such delegation.

### Examination of Orders

- The Committee on Subordinate Legislation examine all Regulations, Rules, Sub-rules, Bye-laws, etc. commonly known as 'Orders', whether laid on the Table of the House or not, framed in pursuance of the provisions of the Constitution or a statute delegating power to a subordinate authority, to make such Orders.

# Supreme Court Vidhik Anuvaad Software (SUVAS)

### Context

- Union Minister for Law and Justice said that the Supreme Court has deployed SUVAS, a machine-assisted translation tool trained by Artificial Intelligence, to promote regional languages in judicial procedure.

### Details

- To promote regional languages in judicial procedure, the Supreme Court has developed Supreme Court Vidhik Anuvaad Software (SUVAS) which is a machine-assisted translation tool trained by Artificial Intelligence.
- SUVAS has been developed with technical support from Ministry of Electronics and Information Technology (MeitY).
- This tool is specially designed for judicial domain and currently has the capacity of translating English judicial documents, orders or judgments into 10 vernacular languages -- *Hindi, Kannada, Tamil, Telugu, Punjabi, Marathi, Gujarati, Malayalam, Bengali, Urdu and vice-versa.*
- Article 348(1)(a) of the Constitution of India states that all proceedings in the Supreme Court and in every High Court, shall be in English language. However, Clause (2) of Article 348 of the Constitution states that notwithstanding anything in sub-clause (a) of clause (1), the Governor of a state may, with the previous consent of the President,

authorize the use of Hindi language, or any other language used for any official purposes of the state, in proceedings in the High Court having its principal seat in that state. The Cabinet Committee's decision dated 21.05.1965 has stipulated that consent of the Chief Justice of India be obtained on any proposal relating to use of a language other than English in the High Court.

- Accordingly, the use of Hindi in the proceedings of the High Court of Rajasthan was authorized under clause (2) of Article 348 of the constitution in 1950. After the Cabinet Committee's decision dated 21.05.1965, the use of Hindi was authorized in the High Courts of Uttar Pradesh (1969), Madhya Pradesh (1971) and Bihar (1972) in consultation with the Chief Justice of India.

# Pradhan Mantri Janjati Adivasi Nyaya Maha Abhiyan

### Context

- The Ministry of Tribal Affairs has initiated an Information, Education, and Communication campaign on Pradhan Mantri Janjati Adivasi Nyaya Maha Abhiyan.

### Details

- The campaign is meant to **raise awareness and ensure hundred percent saturation of Government schemes in Particularly Vulnerable Tribal Groups (PVTG) majority tribal habitations.**
- The campaign aims to **reach out to twenty-two thousand PVTG tribal habitations in two hundred districts across the country.**
- This initiative will ensure to cover every Vulnerable Tribal Group household that has remained unreached because of distance, lack of road and digital connectivity and will provide facilities at their doorstep.
- During the campaign period, Aadhar card, community certificate and Jan Dhan accounts will be provided, which is required for Ayushman card, PM Kisan Samman Nidhi and Kisan credit card.
- Haat Bazar, Common Service Centre, Gram panchayat, Anganwadi, Vandhan Vikas

Kendras and Krishi Vigyan Kendras will be used to organise these events.

## Pradhan Mantri Janjati Adivasi Nyaya Maha Abhiyan

- The Pradhan Mantri Janjati Adivasi Nyaya Maha Abhiyan (PM JANMAN) on 29th of November, 2023.
- The Mission would provide PVTG families and communities (Particularly Vulnerable Tribal Groups) with a wide range of essential services, including:
  1. Safe housing;
  2. Clean drinking water;
  3. Improved access to healthcare;
  4. Education, and nutrition;
  5. Road and telecommunications connectivity, and;
  6. Opportunities for sustainable livelihood.
- In the following 3 years, the Mission would be carried out with funding of Rs. 15,000 Crore from the Development Action Plan for the Scheduled Tribes (DAPST).
- The 11 crucial interventions to be carried out by the PM-JANMAN, including Central Sector and Centrally Sponsored Schemes through 9 Ministries, including the Ministry of Tribal Affairs include:
  1. Provision of pucca houses;
  2. Connecting roads;
  3. Providing Piped water supply;
  4. Ensuring Community water supply;
  5. Providing Mobile medical units with medicine cost;
  6. Construction of hostels;
  7. Providing Vocational education and skilling;
  8. Construction of Anganwadi Centres;
  9. Construction of Multipurpose Centres (MPC).

## Vulnerable Tribal Population as per the 2011 Census

- The 2011 census of India had put the Vulnerable Tribal Population at 10.45 Crore in 75 communities spread across 18 States and the Union Territory of Andaman and Nicobar Islands, classified as Particularly Vulnerable Tribal Groups (PVTGs), considered still vulnerable in the social, economic, and educational spheres.
- Intervention of Ministries under the Mission

## Under the Mission:

- The Ministry of Ayush will establish an Ayush Wellness Centre in accordance with the current regulations and Mobile Medical Units, to allow Ayush amenities to be extended to PVTG residences;
- The Ministry of Skill Development and Entrepreneurship will facilitate skill and vocational training in PVTG habitations, Multipurpose centres, and hostels, as per the suitable skills of these communities.

# Central Water Commission (CWC)

## Context

- Kerala will shortly renew its campaign for a new dam at Mullaperiyar as the revised Detailed Project Report (DPR) for the new structure is getting ready.
- The new DPR, complies with the guidelines of the Central Water Commission.

## Details

### Establishment Year

- 1945

### Parent Ministry

- Ministry of Jal Shakti, Government of India

### Role and Function

- Water resource assessment and planning.
- Implementation and monitoring of water-related projects.
- Flood forecasting and management.
- Interstate water dispute resolution.
- Research and development in water resources.

### Organizational Structure

- Headquartered in New Delhi.
- Regional offices across India.

### Key Initiatives

- **National Water Informatics Centre (NWIC):** For water-related data collection, storage, and dissemination.
- **Flood Management Studies (FMS):** Undertakes studies to improve flood management strategies.

## Projects and Schemes

- Implementation of major and medium irrigation projects.
- River basin studies and development planning.

## Interstate Water Disputes

- Acts as an arbitrator and mediator in resolving water-related disputes between states.

## Significance

- Plays a crucial role in the planning and management of water resources in India.
- Facilitates coordination among different states for effective water resource management.

## Collaborations

- Collaborates with various national and international agencies for research and project implementation.

## Challenges

- Complexities in resolving interstate water disputes.
- Addressing issues related to water scarcity and efficient water use.

## Future Prospects

- Continuation of efforts to enhance water resource management, efficiency, and address emerging challenges.

# Section 498A of IPC

## Context

- The Supreme Court has held that one discordant instance of bad behaviour could not be classified as harassment or cruelty for dowry under Section 498A of the Indian Penal Code.

## Details

### Section Number

- 498A

### Title

- Cruelty by Husband or Relatives

### Objective

- To address cruelty and harassment faced by married women in their matrimonial homes.

### Cognizable Offense

- Yes, the police can make an arrest without a warrant.

## Non-Bailable Offense

- Yes, the accused can be granted bail, but it's non-bailable, meaning bail is not a matter of right.

## Punishment

- Imprisonment for a term which may extend to three years.
- Fine may also be imposed.

## Scope

- Protects wives from cruelty by husbands or relatives.
- Covers physical, mental, or emotional harm, or harassment for dowry.

## Elements of the Offense

- Cruelty by husband or his relatives.
- Cruelty may be physical or mental.
- Demand for dowry or harassment for dowry.

## Landmark Judgment

- The Supreme Court, in the case of Arnesh Kumar v. State of Bihar (2014), emphasized the need to prevent misuse of the provision and suggested the police to not arrest automatically in such cases without proper investigation.

## Controversies and Concerns

- Misuse leading to harassment of innocent family members.
- Calls for amendments to prevent false cases and protect the rights of the accused.
- Social stigma attached to being accused under Section 498A.
- Lack of defined guidelines on what constitutes 'cruelty' and 'harassment.'

## Concrete Solutions

- **Strengthening Investigation Procedures:** Implement stringent guidelines to ensure thorough investigations before making arrests under Section 498A.
- **Mediation and Counselling:** Promote mediation and counselling services to resolve disputes, reducing the need for legal intervention.
- **Legal Awareness Campaigns:** Conduct campaigns to educate people about their rights and responsibilities under Section 498A, reducing the likelihood of false complaints.

- **Review and Amendment:** Periodic reviews of the effectiveness of Section 498A, considering amendments to address concerns and ensure fairness.

### Balanced Implementation

- Ensuring a balanced approach that protects the rights of both complainants and the accused.

### Government Initiatives

- Various legal reforms and guidelines to prevent misuse and promote fairness in cases related to Section 498A.

### Relevance to UPSC

- Understanding of social and legal issues, especially related to women's rights and family law, is crucial for UPSC exams.

### Challenges

- Balancing the protection of women's rights with preventing misuse and protecting the rights of the accused.

### Way Ahead

- Continuous review and amendments to ensure the provision serves its intended purpose without unintended consequences.
- Sensitizing law enforcement agencies and the judiciary for fair and unbiased implementation.

### Recent Developments

- Any amendments or changes to Section 498A should be considered for the most recent developments.

# Medtech Mitra Portal

### Context

- Recently, the MedTech Mitra Portal was launched.

### What is MedTech Mitra?

- MedTech Mitra is a platform that will assist the nation's youthful talent by holding their hands, providing their knowledge, research, and logic a final form, and assisting them in obtaining regulatory approval.

### Objective

- The medical device industry is a crucial and fundamental part of India's healthcare system. India is adopting a holistic approach to health to revolutionize the nation's healthcare

system by 2047, in line with the Viksit Bharat vision.

### Features & Benefits of MedTech Mitra Portal

- Medtech is the one industry with significant growth potential.
- By 2030, the med-tech business in India is expected to **reach $50 billion in revenue.**
- This cooperative effort would make it easier for the country to produce inexpensive, high-quality medical technology products and diagnostics, which would significantly lessen the industry's reliance on imports.
- The minister said that the medical device industry in India is heavily reliant on imports, with imports making up as much as 80% of the market in certain instances.
- Nevertheless, the government has implemented measures to guarantee the domestic supply of medical equipment.
- This industry has advanced astronomically since production-linked incentive programs, investments in medical drug parks, medtech research policy, and MedTech research incentive programs were put in place.
- A distinct platform for MedTech companies has been developed by the government, following the introduction of the National Medical Device Policy and a Rs 5,000 crore initiative to encourage research in the pharmaceutical and MedTech industries.
- Industry statistics show that India barely holds 1.5% of the world market for medical devices.
- Currently **ranking fourth in Asia** for the production of medical equipment, India employs 8% of the world's workforce for medtech research and development.

### Eligibility Criteria for MedTech Mitra

- The applicant must be a citizen of India.
- The applicant must be a healthcare entrepreneur.

# Anganwadi-Cum-Crèche Initiative

### Context

- National Level Programme on Anganwadi-Cum-Crèche Under Palna was held at Vigyan Bhawan, New Delhi.

## Anganwadi-Cum- Crèche initiative

- The **Anganwadi-Cum- Crèche initiative** under the Palna Scheme underwent revisions and was included as part of the Samarthya subcomponent of Mission Shakti.
- The central aim of Anganwadi-cum- Crèches is to meet the demand for quality childcare facilities and enable women to actively participate in the workforce.
- The Anganwadi-cum-Crèche (Palna) scheme aims to address the gap that exists particularly in urban areas where support for childcare from family members is not available and there is a need for institutional support to facilitate the contribution of women in the economy.

## Palna Scheme under Mission Shakti

- The Ministry of Women and Child Development issued guidelines of Mission Shakti wherein erstwhile National
- Creche Scheme has been reorganized and renamed as the Palna Scheme **under the sub-scheme 'Samarthya' of 'Mission Shakti'.**
- Under Palna Scheme, the provision of Anganwadi cum Creches has been introduced bythe Ministry of Women and Child Development. Further, the crèches which were running under erstwhile National Creche Scheme have been included as Stand Alone Creches.

## Objectives:

- Quality crèche care facility by providing a safe and secure environment forchildren.
- To support nutritional, health and cognitive development of children.
- Enable mothers to take up gainful employment.

## Key Services:

- Sleeping facility
- Early stimulation for children below 3 years of age.
- Pre-school education for children between the ages of 3 to 6 years
- Supplementary nutrition (to be locally sourced).
- Growth Monitoring, health check-ups and immunization.

# National Medical Commission

## Context

- The National Medical Commission (NMC) is a crucial institution in the healthcare sector in India, and its establishment marks a significant shift in the regulatory framework for medical education and practice. Here's an overview of the National Medical Commission, considering its relevance from the UPSC (Union Public Service Commission) point of view:

## Background:

- **Replacement of MCI:**
- The National Medical Commission Act, 2019, came into effect on September 25, 2020, replacing the Medical Council of India (MCI).

## Objective:

- The primary objective of the NMC is to reform medical education and regulate the medical profession in India to ensure high-quality healthcare services.

## Structure and Composition:

### Composition:

- The NMC is composed of a Chairperson, who is a person possessing experience in the field of medicine or public health administration, and members with diverse expertise, including medical professionals, eminent administrators, and individuals with experience in law or management.

## Advisory Councils

- The Act provides for the establishment of four autonomous boards under the NMC, each focusing on undergraduate education, postgraduate education, medical assessment and rating, and ethics and medical registration. These boards advise the NMC on their respective domains.

## Functions and Responsibilities

### Regulation of Medical Education:

- The NMC is responsible for formulating policies and regulations for regulating medical education at the undergraduate and postgraduate levels.

### Assessment and Rating:

- The NMC, through its autonomous board for medical assessment and rating, assesses and

rates medical institutions based on various criteria, ensuring quality standards are maintained.

## Entrance Examinations:

- The NMC is tasked with conducting or overseeing the organization of common entrance examinations for admission to undergraduate and postgraduate medical education.

## Curriculum and Guidelines:

- The NMC prescribes the minimum standards of medical education, including the curriculum, guidelines for examinations, and maintenance of a uniform standard across medical institutions.

## Medical Ethics and Registration:

- The NMC, through its autonomous board on ethics and medical registration, is responsible for establishing a robust ethical framework for the medical profession and maintaining a national register of licensed medical practitioners.

## Challenges and Controversies:

### Mixed Reactions:

- The establishment of the NMC has been met with both support and criticism. While it aims to bring reforms to the medical education system, some stakeholders express concerns about certain provisions and changes.

### Autonomy of Boards:

- The autonomy of the boards under the NMC has been a point of discussion, with some stakeholders emphasizing the need for independence to ensure effective functioning.

### Impact on Medical Colleges:

- The new regulatory framework has implications for existing medical colleges and their adherence to revised standards, leading to adjustments and sometimes challenges in compliance.

## Concrete solutions to address some of the challenges associated with the NMC:

### Stakeholder Engagement:

- **Solution:** Establish regular channels of communication with various stakeholders, including medical professionals, educators, and institutions. Conduct regular consultations to address concerns and gather feedback on policy decisions.

### Autonomy of Boards:

- **Solution:** Clearly define the roles and responsibilities of each autonomous board under the NMC. Ensure that these boards have sufficient autonomy to carry out their functions while maintaining coordination with the central body.

### Quality Standards in Medical Education:

- **Solution:** Regularly review and update the minimum standards for medical education. Encourage institutions to adopt best practices and innovative teaching methodologies. Implement a transparent evaluation system to ensure continuous improvement in the quality of education.

### Common Entrance Examinations:

- **Solution:** Enhance the transparency and fairness of common entrance examinations. Provide detailed information about the examination process, syllabus, and evaluation criteria. Implement measures to prevent malpractices and ensure the integrity of the examination system.

### Addressing Concerns of Existing Medical Colleges:

- **Solution:** Conduct impact assessments and capacity-building programs for existing medical colleges to help them adapt to the revised standards. Provide guidelines and financial support for infrastructure improvements and faculty development.

### Ethical Framework and Registration:

- **Solution:** Strengthen the ethical framework for the medical profession. Conduct awareness campaigns on ethical practices and professional conduct. Streamline the registration process, making it more accessible and efficient for medical practitioners.

### Regular Review and Amendments:

- **Solution:** Establish a system for periodic reviews of NMC policies and regulations. Encourage a dynamic approach that allows for amendments based on evolving needs and emerging challenges in the healthcare sector.

### Training Programs for NMC Personnel:

- **Solution:** Conduct regular training programs for NMC officials and staff to enhance their understanding of the healthcare landscape, emerging technologies, and international best practices. This will ensure that the NMC remains well-informed and adaptable.

### Public Awareness Programs:

- **Solution:** Implement public awareness campaigns to educate the general public about the role and functions of the NMC. Foster a positive perception of the NMC's efforts to improve medical education and healthcare delivery.

### Collaboration with International Bodies:

- **Solution:** Foster collaboration with international health organizations and regulatory bodies. Exchange best practices, participate in joint research initiatives, and leverage global expertise to enhance the effectiveness of the NMC.

### Continuous Monitoring and Evaluation:

- **Solution:** Establish a robust monitoring and evaluation mechanism to assess the performance and impact of the NMC. Use data-driven insights to identify areas for improvement and adjust policies accordingly.

### Closing Remarks

- Implementing these solutions requires a collaborative effort involving the NMC, medical professionals, educational institutions, policymakers, and the public. Regular feedback loops and adaptive strategies will contribute to the sustained success of the NMC in achieving its goals and overcoming challenges in the healthcare sector.

# Mera Gaon Meri Dharohar (MGMD)

### Context

- The Government of India has decided to prepare mapping and documentation of all villages under the *Mera Gaon, Meri Dharohar (MGMD) programme.*

## Mera Gaon Meri Dharohar (MGMD)

### About

- Mera Gaon Meri Dharohar (MGMD) is a pan-India initiative of Ministry of Culture under National Mission on Cultural Mapping and was launched on 27th July 2023.

### Objective

- The main objective the project is to culturally map India's 6.5 lakh villages, spanning 29 States and 7 Union Territories, on a comprehensive virtual platform.
- Through MGMD, people will get an opportunity to immerse themselves in the diverse and vibrant cultural heritage of India.
- The core idea behind this project is to encourage appreciation for India's culture and traditions, paving way for economic growth, social harmony, and artistic development in rural communities.

### Categories

- Under MGMD, information is collected under seven broad categories given below:
  o Arts and Crafts Village
  o environmentally oriented village
  o Educational village linked to the textual and scriptural traditions of India
  o Epic village associated with Ramayana, Mahabharata and/or mythological legends and oral epics
  o Historic village linked to local and national history
  o Architectural Heritage Village

### MGMD portal

- This comprehensive portal showcases essential information about each village, including its geographical location, demographic aspects, and description of traditional dresses, ornaments, arts and crafts, temples, fairs, festivals, and much more.
- It serves as a one-stop destination for discovering, exploring, researching, and virtually visiting every village in the country. Moreover, users have the opportunity to earn incentives and takeaways as they embark on their digital village journeys.

# Indian Forest & Wood Certification Scheme

## Context

- The Ministry of Environment, Forests and Climate Change has launched the Indian Forest & Wood Certification Scheme.

## Details

- This national forest certification scheme **offers voluntary third-party certification designed to promote sustainable forest management and agroforestry in the country**.
- The scheme includes forest management certification, tree outside forest management certification, and chain of custody certification.
- The Indian Forest and Wood Certification Scheme can provide market incentives to various entities that adhere to responsible forest management and agroforestry practices in their operations. This includes state forest departments, individual farmers, or Farmer Producer Organizations engaged in agroforestry and farm forestry, as well as other wood-based industries in the value chain.
- The Forest Management certification is **based on the Indian Forest Management Standard, consisting of 8 criteria, 69 indicators and 254 verifiers**, which is an <u>integral part of the National Working Plan Code 2023</u>, launched earlier this year.
- A <u>separate Trees Outside Forests Standard</u>, is now introduced as a part of the newly launched Indian Forest & Wood Certification Scheme.
- The Indian Forest and Wood Certification Scheme, **will be overseen by the Indian Forest and Wood Certification Council**, which will act as a multistake holder advisory body. The Council is represented by members from eminent institutions such as the Indian Council of Forestry Research and Education, Forest Survey of India, Quality Council of India, and Indian Institute of Forest Management including representatives from the Ministries of Agriculture and Farmers' Welfare and Ministry of Commerce and Industry, State Forest Departments, Forest Development Corporations, and representatives from wood-based industries.

- Indian Institute of Forest Management, Bhopal **will act as the scheme operating agency and will be responsible for the overall management of the Indian Forest and Wood Certification Scheme.**
- The National Accreditation Board for Certification Bodies under the Quality Council of India will accredit the certification bodies which will carry out independent audits and assess adherence of various entities to the standards prescribed under the scheme.

# Technology Development Fund

## Context

- The Technology Development Fund (TDF) scheme has so far sanctioned 70 projects amounting to Rs 291.25 crore to various industries.

## Technology Development Fund (TDF) scheme

### About

- The Technology Development Fund (TDF) scheme is a flagship programme of Ministry of Defence executed by DRDO under 'Make in India' initiative.

### Objectives

- To provide Grant in Aid to Indian industries, including MSMEs and Start-ups, as well as academic and scientific institutions for the development of Defence and dual use technologies that are currently not available with the Indian defence Industry.
- To engage with the private industries especially MSMEs and Start-ups to bring in the culture of Design & Development of Military Technology and support them with Grant in Aid.
- To focus on Research, Design & Development of Niche technologies which are being developed for the first time in the country.
- To create a bridge amongst the Armed Forces, research organizations, academia and qualifying/certifying agencies with private sector entities.

- To support the futuristic technologies having a Proof of Concept and converting them into prototype.

### Benefits of the Scheme

- Capacity and capability building of Indian industries for design and development of defence technologies in the country.

- Creation of an ecosystem of R&D where industry and Academia work together to meet the current and futuristic requirement of Armed Forces and defence sector.

- Building of Defence manufacturing ecosystem in country.

- Achieving 'Aatmanirbharta' in defence technology.

## 1.16  SNIPPETS

### Nagaland Statehood Day

- Nagaland is celebrating its statehood day.
- Nagaland Statehood Day is observed every year on December 1 since the state was formally inaugurated as the 16th State of the Union in 1963. A democratically elected government took office in 1964. This year, Nagaland is celebrating its 61st Statehood Day.
- Nagaland is bordered by Myanmar in the east, Arunachal Pradesh in the north, Assam in the west, and Manipur in the south.

### Hattee Community

- Thousands of members of the Hattee Community gathered to seek immediate implementation and begin the issuance of ST certificates.
- The Hattees are a closely-knit community known for their traditional occupation of selling homegrown crops, vegetables, meat, and wool in small-town markets called 'haat'.
- Their homeland spans the Himachal Pradesh-Uttarakhand border, specifically in the basin of the Giri and Tons rivers, both tributaries of the Yamuna. The Tons River demarcates the border between the two states.
- Presently, the estimated population of the Hattees stands at around 3 lakh.

### Cyber Surakshit Bharat Initiative

- Cyber Surakshit Bharat is an initiative of the Ministry of Electronics and Information Technology (MeitY).
- It was conceptualized with the mission to spread awareness about cybercrime and build the capacities of Chief Information Security Officers (CISOs) and frontline IT officials across all government departments, to combat the growing menace.
- The initiatives aim to ensure that government departments can protect their digital infrastructures and are ready to thwart cyber-attacks.

## Ethics Committee

- The ethics committee of the Lok Sabhahas recommended the expulsion of Trinamool Congress Member of Parliament (MP) Mahua Moitra.
- The ethics committee was constituted in 2000, to oversee the moral and ethical conduct of members and examine cases of 'unethical conduct' referred to it.
- The Committee examines complaints filed against members of the House by other members; outsiders through a member; or referred by the Speaker.
- The Committee makes a prima facie inquiry before deciding to examine a complaint and presents its report to the Speaker, who places it before the House for consideration.
- It must be noted that the term 'unethical' is not defined. It is left to the Committee to decide whether any act is unethical or not.

## 1.17   1 MAINS & 5 MCQs

*Q1. Examine the implications of integrating Artificial Intelligence (AI) in the Indian judiciary. Evaluate benefits, challenges, and ethical considerations. Discuss specific areas of application, and propose policy recommendations to address accountability and bias issues. Provide examples from national and international perspectives.*

### Introduction

- The integration of Artificial Intelligence (AI) in the Indian judiciary marks a transformative era with both promises and challenges.

### Benefits of AI in Judicial Processes:

- AI applications offer improved efficiency in legal research, document analysis, and case management. The adoption of AI in legal research platforms has significantly reduced the time spent on analyzing precedents and relevant case laws, enhancing the overall speed of judicial processes.
- According to a study by the National Institution for Transforming India (NITI Aayog), AI-assisted legal research has shown a 30% increase in the pace of case disposal in select courts.

### Challenges and Ethical Considerations:

- However, the infusion of AI in the judiciary brings forth ethical considerations and challenges. The potential for bias in AI algorithms poses a risk to fair decision-making. A report by the Centre for Internet and Society highlighted instances of bias in facial recognition technologies used by law enforcement agencies, indicating the need for careful scrutiny in judicial applications.

### Specific Areas of Application:

- AI's application in legal analytics, predictive analysis of case outcomes, and smart contracts showcases its versatility. In India, the introduction of AI in virtual courts during the COVID-19 pandemic demonstrated its potential for remote proceedings, ensuring access to justice even during crises.

### Policy Recommendations:

- To address accountability and bias concerns, a robust legal framework is imperative. Regular audits of AI algorithms, transparent disclosure of the technology's limitations, and ongoing training for judicial personnel are essential. The judiciary should collaborate with technologists, legal experts, and ethicists to create guidelines for responsible AI use.

### Conclusion:

- In conclusion, while AI brings efficiency to the Indian judiciary, careful attention must be paid to ethical considerations. A balanced approach involving technological innovation and ethical safeguards can ensure that AI enhances, rather than hinders, the principles of justice in India.

**Q2. The Central Water Commission (CWC) in India plays a crucial role in water resource management. What is the primary function of the CWC?**

A) Monitoring and managing coastal erosion

B) Regulating water temperature in major rivers

C) Facilitating inter-basin water transfer

D) Implementing national flood insurance programs

**Q3. The Faster Adoption and Manufacturing of Electric Vehicles (FAME II) scheme in India aims to boost the electric mobility sector. What specific financial incentive does FAME II provide to promote the adoption of electric vehicles?**

A) Subsidies on electric vehicle insurance

B) Cash incentives for electric vehicle manufacturers

C) Rebates on electricity bills for electric vehicle owners

D) Direct subsidy on the purchase of electric vehicles

**Q4. S. R. Bommai v. Union of India, a watershed moment in constitutional jurisprudence, solidified the Court's stance on a foundational principle. Which complex doctrine, asserting the** inviolability of certain constitutional elements, did the Supreme Court reiterate?

A) Doctrine of Constitutional Indeterminacy

B) Doctrine of Constitutional Immutability

C) Doctrine of Constitutional Consecration

D) Doctrine of Intrinsic Constitutional Limitations

**Q5. In legal proceedings, what does the term "Ex-parte decree" refer to?**

A) A decree passed in the absence of one of the parties

B) A decree based on mutual consent of both parties

C) A decree delivered by a foreign court

D) A decree related to property disputes

**Q6. The Committee on Subordinate Legislation plays a vital role in parliamentary oversight. What is the specific function of this committee?**

A) Reviewing legislation proposed by state governments

B) Scrutinizing and ensuring the conformity of subordinate legislation to the Constitution

C) Formulating guidelines for drafting primary legislation

D) Evaluating international treaties and agreements

**ANSWERS: 2) C, 3) D, 4) D, 5) A, 6) B**

# 2. INTERNATIONAL RELATIONS

## 2.1    INDIA-KENYA BILATERAL RELATIONSHIP

### Context
- Recently India on Tuesday extended a $250 million Line of Credit for modernisation of agriculture in Kenya.



### Details
- Announcing the initiative PM Modi said both sides will carry out joint military exercises and will collaborate on counter-terror projects. Welcoming the Indian initiatives, President William Samoei Ruto, described the Indian community of Kenya as a "bridge" between the two countries and said Indians residing in Kenya regard his country as their "first country".

### About India - Kenya Relationship
#### Diplomatic Relations:
- India and Kenya established diplomatic relations soon after Kenya gained independence in 1963. The diplomatic ties have been characterized by mutual respect and cooperation.

#### Trade and Economic Cooperation:
- Economic engagement between India and Kenya has grown, with trade, investments, and economic cooperation being key components. Both countries have sought to enhance bilateral trade and explore opportunities for collaboration in sectors such as agriculture, technology, and infrastructure.

#### Indian Diaspora:
- The Indian diaspora in Kenya has played a significant role in the economic and social development of the country. The presence of a vibrant Indian community has contributed to cultural exchanges and people-to-people ties.

#### Development Assistance:
- India has provided developmental assistance to Kenya, including projects related to capacity building, healthcare, and infrastructure. This assistance is aimed at supporting Kenya's socio-economic development.

#### Security Cooperation:
- India and Kenya have cooperated on security issues, including counter-terrorism efforts and maritime security. The two countries share concerns related to regional stability and have engaged in discussions on addressing common security challenges.

#### International Collaboration:
- India and Kenya often collaborate on various international forums, including the United Nations, where both countries work together on issues of global importance.

#### Cultural and Educational Exchanges:
- Cultural and educational exchanges have played a role in strengthening the ties between the two nations. These exchanges contribute to a better understanding of each other's cultures and traditions.

### Challenges
#### Trade Imbalance:
- One challenge is the trade imbalance between the two countries. While there is significant potential for trade, the balance is currently tilted in India's favor. Addressing this imbalance and promoting more balanced economic cooperation could be a focus area.

#### Infrastructure Development:
- While India has been involved in various infrastructure projects in Kenya, challenges related to project implementation, delays, and ensuring sustainable development may arise. Effective collaboration and addressing

infrastructure challenges are crucial for the success of joint projects.

## Competing Global Alliances:

- Both India and Kenya have diverse diplomatic engagements with various countries and regional organizations. The challenge lies in managing these relationships and ensuring that divergent interests in different global forums do not strain the bilateral ties between India and Kenya.

## Security Concerns:

- Both countries face security challenges, including terrorism and regional instability.

Cooperation in addressing these security concerns, intelligence sharing, and joint efforts to counter transnational threats are vital for the stability of the region.

## Conclusion

- Despite these challenges, it's important to note that India and Kenya have a strong foundation of historical ties, shared values, and mutual interests. Diplomatic engagement, dialogue, and collaborative efforts can help address challenges and foster a more robust and resilient bilateral relationship.

## 2.2 CODEX ALIMENTARIOUS COMMISSION

## Context

- Recently, India has been unanimously elected as a member representing the Asian region in the Executive Committee of the Codex Alimentarius Commission (CAC).



## Details

- India has played a pivotal role in making the millet choice of the common man. India's proposal will set the benchmark in highlighting millet and its benefits worldwide.
- India shows the way forward for global standards for these nutri-cereals.
- **The current session marks the 60th anniversary of the Codex Alimentarius Commission**, of which India has been a member since 1964. India has so far chaired 12 EWGs and co-chaired 28 EWGs relating to various Codex standards/texts and guidelines.

## About Codex Alimentarious Commission (CAC)

- The Codex Alimentarious Commission (CAC), an **international food safety and quality** standard-setting body created by **WHO and**

**FAO of the United Nations with 188 member** countries, has praised India's Standards on Millets and accepted its proposal for the development of global standards for millets during its **46th session held in Rome, Italy.**

- **India has framed a comprehensive group standard for 15 types of millets** specifying 8 quality parameters, which received resounding applause at the international meet. **Codex currently has standards for Sorghum and Pearl Millet.**
- India put forward a proposal for the development of global standards for millet, particularly for *Finger millet, Barnyard millet, Kodo millet, Proso millet, and Little millet as group standards as in the case of pulses.*
- The proposal was unanimously endorsed in the session at **FAO Headquarters in Rome,** which is being attended by representatives from 161 member countries, including the European Union (EU).

## Types of Codex Standards

## General Standards, Guidelines, and Codes of Practice:

- **Hygienic Practice**: Focuses on the sanitary and hygienic conditions for food production, handling, and distribution.
- **Labeling**: Specifies requirements for food labeling, including information such as ingredients, nutrition facts, and allergen information.

- **Contaminants**: Sets limits for contaminants in food, such as pesticides, veterinary drugs, and microbiological contaminants, to ensure food safety.
- **Additives**: Addresses the use of food additives, including permissible types and their maximum levels in various food products.
- **Inspection & Certification**: Provides guidelines for food inspection and certification procedures to ensure compliance with established standards.
- **Nutrition**: Covers nutritional aspects of food, including requirements for nutrient content claims and nutritional labeling.
- **Residues of Veterinary Drugs and Pesticides**: Establishes maximum residue limits for veterinary drugs and pesticides in food products.

**Commodity Standards:**
- Commodity standards focus on specific food products or groups of related products.
- They outline the essential **characteristics, quality parameters, and processing requirements for particular food items.**
- Examples include standards for specific fruits, vegetables, meat, dairy products, and more.
- These standards ensure consistency and quality within specific food categories.

**Regional Standards:**
- **Developed by Regional Coordinating Committees** in specific geographic areas to address regional needs and considerations.
- Applicable to products produced, traded, and consumed within those regions.
- May include variations or additional requirements based on regional circumstances.
- These standards complement the general standards and provide region-specific guidelines.

## 2.3   INTERNATIONAL MARITIME ORGANISATION

### Context
- India was re-elected to the International Maritime Organisation (IMO) Council.



### Details
- India was re-elected to the International Maritime Organisation (IMO) Council with the highest tally.
- India's re-election falls under the Category of 10 states with the largest interest in international seaborne trade.
- India got **157 votes out of the 167.**
- The other countries in the category are Australia, Brazil, Canada, France, Germany, Netherlands, Spain, Sweden, and the United Arab Emirates.

- The term of the council will be for the **biennium 2024-25.**

### About the International Maritime Organisation (IMO)
**About**
- The International Maritime Organisation (IMO) is a **specialized agency of the United Nations** responsible for regulating shipping.

**Establishment**
- The IMO was established following an agreement at a UN conference held in **Geneva in 1948.**
- The IMO came into existence ten years later, meeting for the first time on 17 March 1958.

**Headquarters**
- **Headquartered in London, United Kingdom, IMO currently has 175 Member States** and three Associate Members.

**Mandate**
- IMO oversees the maritime sector which in turn underpins international trade, transport, and all maritime activities.

**Structure**

- The council is the executive **organ of IMO and is responsible**, under the assembly, for supervising the work of the organization.
- **Between sessions of the assembly**, the council performs the functions of the assembly, except that of making recommendations to governments on maritime safety and pollution prevention.

## Functions of IMO

### Safety Standards:

- Set global safety standards for ships and other vessels, covering aspects such as navigation, life-saving equipment, fire safety, and ship construction materials.

### Treaty Implementation:

- Ensures member states' adherence to international treaties related to maritime safety, security, and environmental protection.

### Security Regulations:

- Develop and implement measures to enhance the security of ships and port facilities to prevent acts of terrorism and ensure the safety of seafarers and passengers.

### Pollution Prevention:

- Establishes regulations to prevent marine pollution from ships, including measures to control air emissions, ballast water management, and oil pollution prevention.

### Human Element:

- Addresses issues related to the human element in shipping, including training and certification of seafarers, working conditions, and health and safety standards.

### Technical Cooperation:

- Facilitates technical cooperation among member states, providing assistance and support to developing countries in the implementation of maritime regulations and capacity-building.

### Audit and Monitoring:

- Implements an audit and monitoring scheme to assess member states' compliance with international maritime regulations and standards.

### Liabilities and Compensation:

- Monitors liabilities and compensation in the event of breaches of regulations, accidents, or environmental incidents, promoting accountability and responsibility.

### Research and Development:

- Promotes research and development in maritime technology and practices to enhance the safety, efficiency, and environmental performance of the shipping industry.

## Significance of IMO

### Safety at Sea:

- IMO establishes and updates international regulations to enhance the safety of ships, seafarers, and passengers. These regulations cover various aspects

of ship design, construction, equipment, and operation.

### Environmental Protection:

- IMO sets standards and regulations to prevent and control marine pollution from ships, addressing issues such as oil spills, air emissions, and ballast water management. This contributes to the protection of the marine environment and coastal ecosystems.

### Global Trade Facilitation:

- By developing and maintaining international shipping regulations, IMO facilitates the smooth flow of global maritime trade. Standardized rules ensure consistency and reliability in shipping practices, benefiting the world economy.

### Security at Sea:

- IMO establishes measures to enhance the security of ships and port facilities, mitigating the risks of maritime terrorism and ensuring the safety of seafarers, passengers, and cargo.

### Technical Cooperation:

- The IMO promotes technical cooperation among its member states, assisting developing countries in implementing and adhering to international maritime regulations. This helps build capacity and improve safety standards worldwide.

### Uniformity in Maritime Legislation:

- IMO's regulations provide a framework for uniformity in maritime legislation across different countries. This harmonization is crucial for avoiding inconsistencies and promoting a level playing field in the global shipping industry.

### Liabilities and Compensation:

- IMO monitors liabilities and compensation in case of maritime accidents, ensuring that responsible parties are held accountable and victims are appropriately compensated.

### Research and Development:

- The IMO encourages research and development in maritime technology and practices, fostering innovation to improve the efficiency, safety, and environmental performance of the shipping industry.

## 2.4 SRI LANKA'S DEBT CRISIS AND PARIS CLUB

### Context

- Sri Lanka has reached an "agreement in principle" with India and the Paris Club Group of creditors, including Japan.
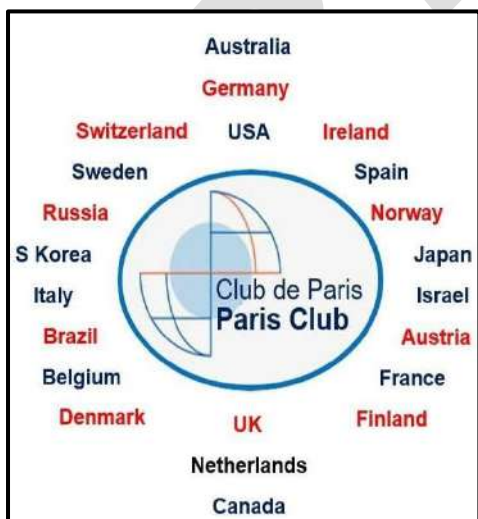


### Details

- The Agreement is on a debt treatment plan that will help the crisis-hit island nation tap the International Monetary Fund's $3-billion recovery package.

### What is the Paris Club?

- The Paris Club is **an informal group of creditor countries that work together to support nations facing financial difficulties,** chiefly those struggling to pay off debts.
- **Established in 1956**, the club has its headquarters in the city it is named after.
- The group **aims to help stabilize the macroeconomic and financial situation** of countries and promote sustainable economic growth.

### About Paris Club's role in Sri Lanka's debt situation

### Diminished Significance:

- The Paris Club has historically been a key player in bilateral lending and debt resolution. However, its importance has waned in the

past two decades, largely due to the emergence of China as a major bilateral lender.

## China's Dominance:

- China has become the world's largest bilateral lender, and its role in global debt dynamics, especially in developing countries, has grown significantly.

## Sri Lanka's Debt Request:

- In the given context, Sri Lanka approached the Paris Club for a bailout of $2.9 billion, indicating its need for financial assistance to address its debt challenges.

## Bilateral Creditors:

- China, Japan, and India were identified as the largest bilateral creditors to Sri Lanka, holding significant portions of the country's debt (52%, 19.5%, and 12%, respectively).

## Paris Club's Efforts:

- The Paris Club sought to involve both China and India in a centralized debt resolution approach for Sri Lanka. This approach aims to coordinate negotiations with multiple creditors to ensure a comprehensive and cohesive debt relief strategy.

## Bilateral Negotiations:

- While Japan's assurance was already included as part of its membership in the Paris Club, Sri Lanka needed assurances from China and

India. However, India opted to pursue separate bilateral negotiations with Sri Lanka rather than participating in the centralized approach proposed by the Paris Club.

## Chinese Moratorium:

- China offered a two-year moratorium on its loans to Sri Lanka. However, this offer was deemed insufficient by some, including the US Under-Secretary of State Victoria Nuland, who expressed dissatisfaction with the terms.

## Indian Submission:

- India's decision to engage in separate bilateral negotiations was acknowledged by the International Monetary Fund (IMF) as a positive development. The IMF did not comment on the Chinese assurance but recognized the Indian submission as a step in the right direction.

## Closing remark

- The dynamics of global debt and the emergence of new creditors, particularly China, have altered the traditional roles of institutions like the Paris Club.
- Sri Lanka's recent engagement with the Paris Club reflects the complex interplay of various creditor nations and the challenges associated with coordinating debt resolution efforts in the current international financial landscape.

## 2.5 INDIA-KOREA ELECTRONIC ORIGIN DATA EXCHANGE SYSTEM

## Context

- **India-Korea Electronic Origin Data Exchange System (EODES)** for faster clearance of imported goods launched.



INDIA-KOREA ELECTRONIC ORIGIN DATA EXCHANGE SYSTEM

## Details

- **To enhance the effective execution of the India-Korea Comprehensive Economic Partnership (CEPA),** the Electronic Origin Data Exchange System (EODES) has been established.
- **The primary objective of EODES** is to facilitate seamless implementation by enabling the electronic exchange of information on the origin of goods traded under CEPA between the customs authorities of both India and Korea.

## About Electronic Origin Data Exchange System

- The Electronic Origin Data Exchange System mandates the immediate electronic sharing of data fields from the Certificate of Origin (CoO) with the importing customs as soon as the certificate is issued by the exporting customs office.
- This real-time sharing of information is designed to expedite the customs clearance process for imported goods, contributing to smoother and more efficient trade operations between the two nations.

- The successful implementation of the EODES project is positioned as a noteworthy global model for international customs cooperation.
- **Streamlining the exchange of electronic information** on the origin of goods, the system not only benefits India and Korea but also sets an example for other countries looking to enhance their customs processes and foster international economic partnerships.

## Bilateral relations between India and the Republic of Korea

### Diplomatic Relations:

- India and the Republic of Korea established diplomatic relations on December 10, 1973.
- The diplomatic relations were elevated to a "**strategic partnership**" in 2010, further enhanced to a **"special strategic partnership"** in 2015 during Prime Minister Narendra Modi's state visit.

### India's Role in the Korean War

- **India's historical involvement in the Korean Peninsula dates back to 1945**.
- Notably, former Indian diplomat Shri K P S Menon chaired the 9-member UN Commission in 1947 for the Korean elections.
- **During the Korean War**, India contributed significantly by sending the 60th Parachute Field Ambulance, a military medical unit, treating around 220,000 patients as part of the UN Command.

### High-Level Exchanges

- In May 2015, Prime Minister Narendra Modi's state visit elevated bilateral relations to a special strategic partnership. This visit marked a milestone in the diplomatic ties between the two nations.

### Economic Relations and Trade

- Trade and economic relations gained momentum after the implementation of the **Comprehensive Economic Partnership Agreement (CEPA) in 2010.**

- The Korea Plus initiative, launched to promote Korean investment in India, further strengthened economic cooperation.
- **Bilateral trade is anticipated to reach $27.8 billion in 2022**, with India's imports at $18.8 billion and exports at $9 billion. Key trade items include mineral fuels, cereals, iron, steel, auto parts, telecommunications equipment, and more.

### Defense Collaboration

- Defense Ministers of both nations have maintained regular contact since 2015, fostering strong defense relations. Annual tripartite service-level talks and a defense industry cooperation roadmap signed in September 2019 reflect the commitment to strengthening defense ties.

### Cultural Exchange

- **The Indian Cultural Center**, later known as the **Swami Vivekananda Cultural Center (SVCC),** was established in 2011. The SARANG Festival, organized annually since 2015, showcases diverse Indian arts and music across various regions of the Republic of Korea.
- The cultural ties between the two nations are further deepened by Nobel laureate Rabindranath Tagore's 1929 poem, **"Lamp of the East,"** which fondly reminisces Korea's glorious past and promising future.

### Indian Diaspora and Educational Ties

- Approximately 15,000 Indian nationals reside in the Republic of Korea, with a significant

number pursuing postgraduate and doctoral degrees, particularly in the pure sciences.

- The Indian diaspora has made notable contributions to industries such **as IT, marine, and automotive, collaborating with prominent companies like Samsung, LG, Hyundai, TATA Daewoo, TCS, and Coupang.**

## Conclusion

- As bilateral trade is poised to reach a record high in 2022 and with a vibrant Indian

diaspora contributing to diverse sectors in the Republic of Korea, the future holds great promise for continued cooperation and strengthened ties between these two dynamic nations. The success of this relationship serves as a positive model for international diplomacy and cooperation, showcasing the potential for mutually beneficial partnerships on the global stage.

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## 2.6    ITALY PULLS OUT OF BRI PACT

### Context

- Recently, Italy has withdrawn from China's Belt and Road Initiative, more than four years after becoming the only G7 nation to sign up.



### Details

- Italian PM Giorgia Meloni had previously signalled Italy's intention to withdraw from the agreement, which was up for renewal.
- The Milan newspaper Corriere della Sera reported that a letter with the formal notice had been delivered to Beijing in recent days. Meloni's office declined to comment on the report.

### Reasons for Italy's Withdrawal from BRI
#### Economic Disappointment:

- Italy, seeking a boost in investment and infrastructure development, joined the **Belt and Road Initiative (BRI) in 2019** amid economic challenges. However, after four years, the anticipated economic benefits have failed to materialize.
- **Chinese Foreign Direct Investment (FDI) in Italy** witnessed a significant decline from USD

650 million in 2019 to a mere USD 33 million in 2021.

- In terms of trade, **Italy's exports to China saw a modest increase from 14.5 billion Euros to 18.5 billion Euros**, while Chinese exports to Italy surged from 33.5 billion Euros to 50.9 billion Euros during the same period.

#### Geopolitical Reevaluation:

- Italy's reconsideration of its involvement in the BRI aligns with a broader trend among European nations reassessing their ties with China.
- **Concerns over China's growing influence, geopolitical realignments**, and strategic considerations, especially in the context of events like the Russia-Ukraine conflict, have prompted Italy to review its stance on the BRI.

#### Alignment with Western Allies:

- Italy's inclination to strengthen ties with **Western allies, particularly within the G7**, plays a pivotal role in its reconsideration of the BRI.
- **With the G7 presidency on the horizon, Italy** may view distancing itself from the BRI as a gesture of solidarity with its Western partners.

#### Negative Publicity and Debt Worries:

- **Globally criticized for potential debt traps** and opaque financial dealings, the BRI has faced scrutiny.
- Reports of other nations grappling with substantial debt burdens due to their

participation in the BRI may contribute significantly to Italy's decision to withdraw.

- **The negative publicity surrounding** the initiative and concerns about financial transparency are key factors shaping Italy's stance.

## About India-Italy Relations

### Historical and Cultural Ties:

- India and Italy share a rich history dating back thousands of years, marked by trade routes and cultural exchanges. Influential figures like Rabindranath Tagore and Mahatma Gandhi have contributed to the historical tapestry of bilateral relations.

### Challenges in Bilateral Relations:

- **Italian Marines Case (2012):** The incident involving two Italian marines accused of killing Indian fishermen strained diplomatic ties. Resolution came in 2021 after Italy paid compensation to India.
- **Agusta Westland Allegations:** Corruption allegations in the Agusta Westland deal led to legal battles, with Italian courts dismissing charges due to insufficient evidence.

## Efforts towards Reconciliation

- **Diplomatic Engagement (2018 onwards):** Official visits, cultural exchanges, and high-level engagements sought to rebuild relations.
- **Strategic Partnerships (2021):** Prime Minister's visit to Italy for the G20 summit

marked milestones, with agreements focusing on defense, trade, and technology.

- **Economic Cooperation:** Italy has become a key trading partner for India within the EU, emphasizing collaborations in defense and technology.

### Reassessing Ties with China:

- Both nations have reevaluated engagements with China, aligning on concerns related to the Belt and Road Initiative (BRI). Italy's reconsideration, driven by economic imbalances, parallels India's opposition due to territorial concerns.

### Collaboration in Various Sectors:

- **Science, Technology, and Research:** Thematic Working Groups and a joint **ASI-ISRO working group in helio-physics** highlight collaboration between the **Italian Space Agency and the Indian Space Research Organisation**.
- **Counter-Terrorism and Security:** Both countries pledge to strengthen cooperation against terrorism and transnational crime, with plans for the 'India-Italy Joint **Working Group on Counter-Terrorism.'**
- **Regional Cooperation:** Acknowledgment of new international organizations, including Italy joining the International Solar Alliance after the universalization of ISA. Cooperation extends to disaster-resilient infrastructures through the **Coalition on Disaster Resilient Infrastructures (CDRI).**

# 2.7   INDIA-OMAN RELATION

## Context

- India and Oman are on track to sign a comprehensive economic partnership agreement, Prime Minister Narendra Modi announced on Saturday.

## Details

- Recently Oman's Sultan Haitham bin Tarik visited India, it marks a significant milestone as it is the first State visit by an Omani ruler in 26 years.
- Welcoming Sultan Haitham bin Tarik the ruler of Oman, to his first State visit to India, Prime Minister Modi said that the presence of a large number of Indians in Oman is a living example of the healthy relationship between the two countries.
- Sultan Qaboos was posthumously honored with the Gandhi Peace Prize for 2019 by India.

- Bilateral discussion held at the Hyderabad House included consultation about the situation in Israel and the Palestinians, Mr. Kwatra said explaining that India is closely following the conflict in Gaza.

## About India-Oman Relationship



- A vision document titled, 'A joint Partnership for the Future' touching all grounds of development is endorsed and accepted firmly.
- India has also proposed to link the Unified Payment Interface (UPI) with Oman's mobile wallet app, Thawani.

### Historical Relations: Maritime Trade Routes

- The ancient maritime trade routes between the Sumerian and Harappan civilizations showcase historical significance, underlining early connections between Mesopotamia and the Indus Valley.

### Oman's Historical Links with India:

- Oman's historical links with India through Gujarat and Tamilakam along the Malabar Coast highlight longstanding maritime and trade relationships.

### Political Engagement and Strategic Partnerships:

- The political engagement between Oman and India has evolved into a strategic partnership. Oman serves as a crucial partner at the Gulf Cooperation Council (GCC), Arab League, and Indian Ocean Rim Association (IORA) forums.

### Special Friendship despite Cold War Dynamics:

- Oman maintained close ties with India during and after the Cold War, distinguishing itself from the pro-Pakistan stance of many Arab countries.

### G20 Summit Invitation:

- As a testament to their special relationship, India has invited Oman as a guest country for the G20 Summit during India's Presidency in 2023.

### Diplomatic Relations and Strategic Partnership:

- Diplomatic ties were established in 1955 and upgraded to a strategic partnership in 2008, based on mutual trust and shared interests.

### Economic Relations:

- India ranks among Oman's top trading partners. It is the 2nd largest market for Oman's crude oil after China and the 2nd largest for non-oil exports after Saudi Arabia.

### Oman-India Joint Investment Fund (OIJIF):

- The OIJIF, established in 2010, is a 50-50 joint venture between the State Bank of India and Oman's State General Reserve Fund, promoting investments in India.

### Digital Infrastructure Initiative:

- India and Oman launched the Rupay debit card in Oman, aligning with India's initiative to promote digital public infrastructure globally.

**Defense Cooperation:**

- Oman stands as India's closest defense partner in the Gulf region, hosting joint exercises with all three wings of the Indian defense forces. The first-ever India-Oman Defence Industrial Seminar occurred in Muscat in 2023.

**Operation Sankalp**

- During the Persian Gulf crisis in 2019, the Indian Navy launched Operation Sankalp to ensure the safe passage of Indian-flagged ships, frequently operating off the coast of Oman.

**Cultural Relations:**

- Deep socio-cultural bonds exist between India and Oman, exemplified by people-to-people contacts and cultural events.

**Yoga Special Events and Festival of India:**

- Oman hosts yoga special events like **'Oman Yoga Yatra'** and **'Yoga for Vasudhaiva Kutumbakam,'** reflecting the rich Indian cultural tradition. The Embassy organized the first-ever 'Festival of India in Oman' in 2017 with support from the Ministry of Culture of India.

**Indian Community and Pravasi Bharatiya Samman Awards:**

- Indian communities in Muscat, Salalah, Sohar, and Sur, organized under Indian Social Clubs, contribute to the strengthening of bilateral relations. Pravasi Bharatiya Samman Awards recognize outstanding contributions of individuals in Oman to bilateral ties.

## Conclusion

- The Sultanate of Oman is a strategic partner of India and an important interlocutor at the Gulf Cooperation Council (GCC), Arab League, and Indian Ocean Rim Association (IORA) fora. India and Oman are linked by geography, history, and culture and enjoy warm and cordial relations.

## 2.8    INDIA AND MALDIVES RELATIONS

## Context

- The Maldives government has decided to not renew an agreement with India that allowed India to conduct hydrographic surveys in Maldivian waters.
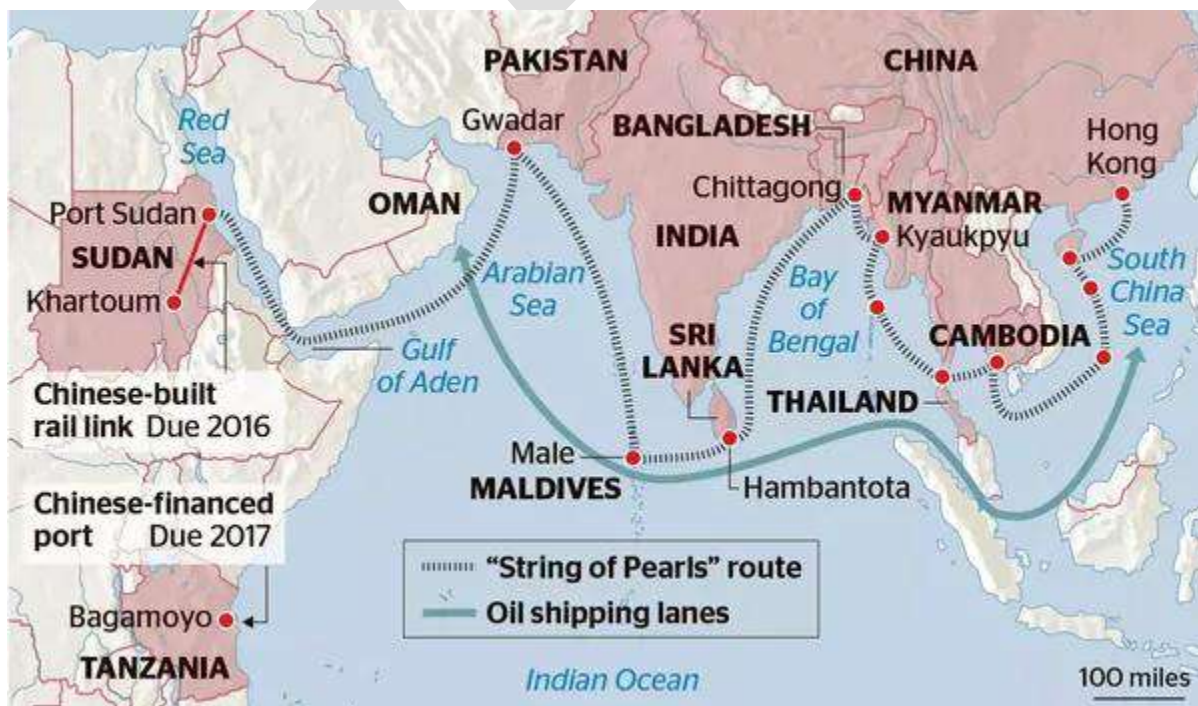
## Details

- The agreement was signed in 2019 during Prime Minister Narendra Modi's visit to the islands when President Ibrahim Solih was in power.
- The new government of President Mohamed Muizzu had earlier this year requested that India pull out its military personnel deployed in the country.

> - India and Maldives are neighbors as they share a maritime border. Relations have been friendly and close in strategic, economic, and military cooperation. India continues to contribute to maintaining security on the island nation.

## About India-Maldives Relations

### Historical relations:

- Both nations' were British colonies.
- India was among the first to recognize **Maldives after its independence in 1965** and to establish diplomatic relations with the country. India established its **mission at Malé in 1972.**
- India and Maldives share **ethnic, linguistic, cultural, religious, and commercial links** steeped in antiquity and enjoy cordial and multi-dimensional relations.

### Political relations:

- India and Maldives have consistently supported each other in multilateral for a such as the **UN, the Commonwealth, the NAM, and the SAARC.**
- **High connectivity:** High People-to-People contacts, as Air India operates daily flights to Malé from Thiruvananthapuram, Bangalore, and Chennai.
- **Tourism:** The proximity of location and improvements in air connectivity in recent years has led to a very substantial increase in the number of Indians visiting Maldives for **tourism** (around 33,000) and business.
- **Soft diplomacy**: India is a preferred destination for Maldivians for **education, medical treatment, recreation, and business.**
- **Diaspora:** Indians are the **second largest expatriate community in the Maldives.**

### Why does the Maldives matter to India?

- **Strategic location:** Maldives holds strategic importance for India under the Modi government's **'Neighborhood First' policy** due to its location in the Indian Ocean.
- The **Eight Degree Channel** is one of the major maritime lanes of the world.
- **Stability, maturity, and democratic system in** the Maldives can ensure peace and security in the Indian Ocean.

## About Major challenges

### Chinese influence:

- India has been quite apprehensive of the growing Chinese influence in Maldives even as it continues to give utmost priority to the island nation. There have been growing concerns regarding China's role in the Maldivian economy through so-called **"debt-trap diplomacy."**
- Maldives incurred a debt of about **$1.4 billion owing** to loans from China to finance several of its infrastructure projects.
- Maldives and China had also entered into a **free trade agreement.**

### India's position in the Male crisis:

- During the pro-Beijing regime of their former President Abdulla Yameen, ties between the nations got strained. There came a point in 2018 when **India even contemplated a military intervention.**

### Dhruv controversy:

- India gave **two Dhruv Advanced Light Helicopters (ALF) to the Maldives in 2010 and 2015** both which were to be used for ocean search-and-rescue operations, maritime weather surveillance, and airlifting patients between islands.
- However, some people in the PPM stirred up a controversy by saying that the **helicopters marked the start of military presence in the country.**
- The Maldives government requested India to take back the helicopters in 2016, but **India refused to do**

### Lack of transparency

- Another issue is the lack of transparency when it comes to the **signing of agreements between India and the Solih government.**

- The Maldives government has refused to share details of agreements signed with India citing **security reasons**

## The Naval Base controversy

- The **Uthuru Thilafalhu** is a **strategically located atoll** near the capital Malé and was called the **UTF Harbour project.**
- Also, in 2016, an action plan was signed by both governments for defense cooperation to enhance the "shared strategic and security interests of the two countries in the Indian Ocean region".

## Measures taken so far

- After coming to power for the second time in May last year, Prime Minister Modi's first international destination was the Maldives.
- He was also the only head of state to attend Maldives President Ibrahim Mohamed Solih's swearing-in ceremony in November 2018, when he came to power ousting Yameen.

- India has also offered a **$ 1.4 billion development assistance** package to the Maldives, which is being utilized in several projects.
- **30 years ago, in 1988, an intervention by the Indian armed forces** - codenamed **'Operation Cactus'** - trounced an attempted coup on the island nation. On November 3, 1988, when mercenaries attacked the Maldives, India was the first to respond.
- **In 2004, when the tsunami hit Maldives**, Indian naval ships were dispatched to assist rescue operations.
- During the Male water crisis. Within four hours Indian Navy and Air Force vessels delivered water.

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## 2.9   INDIA-ASEAN RELATIONS

## Context

- The first round of negotiations for reviewing the FTA, officially known as the ASEAN India Trade in Goods Agreement (AITGA), will be on February 18-19 in New Delhi.

## Details

- India and the ten-member Association of South East Asian Nations (ASEAN) will begin negotiations in February to "modernize" their decade-and-a-half-old free trade agreement (FTA) to bring more balance in the pact currently weighed against New Delhi.



- But new areas like labor, environment, Small and Medium Enterprises (SMEs), and gender, are likely to be kept out, sources have said.

## About Trade deficit:

- **India's trade deficit with the region was at $7.5 billion per annum** when the pact was implemented. This has ballooned to $43.57 billion in FY23. In 2022-23, India's exports to the region were **valued at $44 billion**, while its imports were at **$87.57 billion.**
- _"The Commerce Department has collected inputs from various sectors on tariff and non-tariff barriers faced by them in the ASEAN. Market access for Indian businesses has to go up by addressing both areas,"_.
- **Sectors that need propping up include chemicals and alloys**, plastics and rubber, minerals, leather,

> - India's trade deficit with the region was $7.5 billion annually when the pact was implemented; this has ballooned to $43.57 billion in FY23; negotiations will attempt to bridge this trade gap.

textiles, gems, and jewelry, per an industry analysis.

- "India will also need to make some concessions for the ASEAN as the review will have to benefit both, but the objective of bringing balance has to be central.

## Revamping AITGA

- Modernising the AITGA will include incorporating changes in the Rules of Origin (ROO), which can work in favor of India by increasing market access for some items as well as blocking possible re-routing of goods by China through the ASEAN countries.

## What is ASEAN?

- **Formation of ASA, 1961:** Indonesia, Malaysia, the Philippines, Singapore, and Thailand unite to promote economic, cultural, and social cooperation.
- **Bangkok Declaration, 1967:** Formal establishment of ASEAN with the signing of the ASEAN Declaration in Bangkok, Thailand.
- **First ASEAN Summit, 1976:** Pledge towards regional peace and stability.
- **Treaty of Amity and Cooperation (TAC), 1976:** Establishes a framework for peaceful relations among member states.


ASSOCIATION OF SOUTHEAST ASIAN NATIONS
MYANMAR, LAOS, THAILAND, PHILIPPINES, VIETNAM, CAMBODIA, SINGAPORE, MALAYSIA, BRUNEI DARUSSALAM, INDONESIA

- **ASEAN Free Trade Area (AFTA), 1992:** Aims to create a free trade area among member countries.
- **ASEAN Charter, 2008:** Provides a legal framework for the organization and strengthens its institutional structure.
- **ASEAN Economic Community (AEC), 2015:** Aims to integrate economies of member countries for regional economic growth.
- **ASEAN joins RCEP, 2020:** ASEAN members become part of the Regional Comprehensive Economic Partnership (RCEP), a free trade agreement.

## Strengths of ASEAN as a Regional Grouping:

- **Regional Stability:** Significant role in promoting peace and stability through agreements like the Treaty of Amity and Cooperation.
- **Economic Growth:** Combined population of over 630 million and a growing middle class, making it a dynamic market.
- **Manufacturing and Trade Hub:** Ranks as the 4th largest exporter in world trade.
- **Cultural Diversity:** Rich cultural exchange opportunities among diverse member nations.
- **Strategic Location:** Positioned at the crossroads of major trade routes, especially the crucial Strait of Malacca.
- **Diplomatic Engagement:** Strong ties with major powers, leveraging its strategic position on global issues.

## Opportunities for India within ASEAN:

- **Potential Market:** ASEAN is the 3rd largest market globally, offering export potential for India.
- **Convergence with Indo-Pacific Strategy:** Key component of India's "Act East" policy and "Indo-Pacific" strategy.
- **Countering China's Influence:** Strengthening ties can act as a counterbalance to China's influence in the region.
- **Connectivity with North East:** Initiatives can boost economic development in India's northeastern states.
- **Rule-Based Order:** ASEAN's role is crucial in promoting a rules-based security architecture in the Indo-Pacific region.

## Areas of Cooperation between India and ASEAN:

- **Annual Summit**: Regular high-level summits between India and ASEAN.
- **Trade and Investment:** FTA boosting trade; ASEAN is India's 4th largest trading partner.
- **Regional Connectivity:** Projects like the India-Myanmar-Thailand Trilateral Highway enhancing connectivity.
- **Defense and Security:** Joint military exercises, strengthening defense cooperation.
- **Socio-Cultural Cooperation**: Promoting cultural exchanges and people-to-people ties.
- **Education and Research:** Establishment of the ASEAN-India Centre for research and studies.
- **Funding**: Financial assistance through various cooperation funds.

## Issues and Challenges in India-ASEAN Relations

- **Trade Imbalances**: Growing trade deficit for India with ASEAN nations.
- **Nature of Engagement**: Predominantly bilateral engagement rather than a multilateral approach.
- **Competing Regional Agreements**: Engagement with other regional agreements diverts attention from ASEAN-India relations.
- **Chinese Presence**: China's influence limits ASEAN's utilization of India's potential for regional stability.
- **Limited Connectivity**: Physical and digital connectivity between India and ASEAN countries remains constrained.

## Way Forward to Improve India-ASEAN Relations

- **Enlarging QUAD:** Expand the QUAD to include ASEAN countries in a QUAD+ arrangement.
- **Maritime Security in Indo-Pacific:** Strengthen military ties, filling gaps due to maritime disputes.
- **Strengthening Cultural Connect**: Encourage tourism with creative branding initiatives.
- **Enhancing Connectivity**: Strengthen land, air, and sea linkages to boost people-to-people flows, business, investment, and tourism.
- **Collaborating in International Forums**: Work together in international and regional forums to promote common interests.

## Conclusion

- While there is a lot of potential in the relationship, both sides must work towards strengthening it. Creating a strong bond between ASEAN and India will require taking steps toward the mutual trust and confidence missing in the relationship. Ultimately, both sides must work towards creating a stable partnership. ASEAN countries are a huge and relatively untapped market for India.

## 2.10  INDIA-NEW ZEALAND BILATERAL TRADE MEETING

### Context

- The Union Cabinet chaired by the Prime Minister, Shri Narendra Modi has approved the proposal to open of a Consulate General of India in Auckland, New Zealand.

### Details

- The trade ministers of India and New Zealand met Tuesday to discuss a range of bilateral and multilateral issues. including the long-standing issue of **Public Stock Holding (PSH),** ahead of the **World Trade Organisation's 13th Ministerial Conference** set to take place in February next year in **Abu Dhabi, United Arab Emirates**.
- This comes as New Delhi has begun building consensus among WTO members ahead of the ministerial to push for a permanent

solution on PSH that would result in greater flexibility to provide higher farm support.

- India's agriculture sector continues to be the largest employment-generating sector in the country.

## About India-New Zealand Relations

- India is NZ's 11th largest two-way trading partner with total two-way trade valued at US$1.80 bn during the year ending September 2020.

### Diplomatic Relations

- India and New Zealand have maintained strong diplomatic ties since 1947, fostering a cordial relationship that extends to various international forums, including the United Nations (UN) and the World Trade Organization (WTO). As members of the Commonwealth, both nations share common values, further solidifying their diplomatic bond.

### Trade and Economy

- The economic partnership between India and New Zealand has been steadily growing, encompassing diverse sectors such as agriculture, information technology, and education. The signing of the India-New Zealand Free Trade Agreement (INZFTA) in 2020 reflects a shared commitment to boosting economic ties. In 2021, bilateral trade reached $1.5 billion, underscoring the significance of their economic collaboration.

### Agricultural Collaboration

- Collaboration in the agricultural sector is a focal point of the relationship between India and New Zealand. Both countries actively engage in technology exchange and initiatives aimed at enhancing farming practices. The Agriculture Cooperation Arrangement and the Joint Working Group on Agriculture play pivotal roles in fostering and strengthening this agricultural partnership.

### Education and Cultural Ties

- The robust exchange of education and cultural initiatives is a hallmark of the relationship between India and New Zealand. Indian students actively pursue higher education in New Zealand, contributing to a vibrant academic exchange. Cultural events are actively promoted by both nations, fostering mutual understanding. The Education Cooperation Agreement further enhances collaboration in the academic realm.

### Tourism

- Tourism serves as a significant bridge between India and New Zealand, with both countries capitalizing on their diverse landscapes and rich cultural heritage to attract visitors. Joint efforts in tourism promotion contribute to building people-to-people connections. In 2019, New Zealand welcomed over 60,000 Indian tourists, highlighting the success of their collaborative tourism initiatives.

### Defense and Security

- While defense ties may not be as prominent as other aspects of the relationship, India and New Zealand engage in ongoing dialogues and initiatives to strengthen security cooperation. Key areas of focus include counter-terrorism and maritime security, facilitated by the Defense Cooperation Arrangement, which supports strategic dialogue between the two nations.

### Multilateral Engagement

- India and New Zealand actively participate in global forums, collaborating on shared challenges such as climate change and sustainable development. Both countries advocate for the reform of international organizations and work together in initiatives like the International Solar Alliance, promoting the use of renewable energy on a global scale.

## Way forward
### 1. Economic Synergy:

- Explore avenues to maximize the benefits of the India-New Zealand Free Trade Agreement (INZFTA). Enhance economic cooperation by fostering increased trade and investments across various sectors.

### 2. Innovation and Technology Alliance:

- Promote collaboration in innovation and technology, focusing on renewable energy, biotechnology, and information technology. Joint research and development initiatives can be a catalyst for mutual growth.

### 3. Cultural Diplomacy:

- Broaden cultural exchange programs to strengthen people-to-people connections. Facilitate artistic, educational, and sports exchanges to deepen understanding and appreciation of each other's cultures.

### 4. Tourism Enrichment:

- Sustain joint efforts to boost tourism by showcasing the diverse cultural and natural heritage of both countries. Develop sustainable tourism practices and initiatives to attract a diverse range of visitors.

### 5. Educational Nexus:

- Forge stronger academic collaborations and student exchange programs. Encourage partnerships between educational institutions to foster knowledge-sharing and collaborative research initiatives.

### 6. Environmental Harmony:

- Collaborate on environmental conservation and sustainable development projects. Exchange best practices in addressing climate change, preserving biodiversity, and promoting green technologies.

### 7. Security Synergy:

- Deepen security cooperation through expanded dialogues on counter-terrorism, cybersecurity, and maritime security. Joint military exercises and training programs can enhance the capabilities of both nations.

### 8. Multilateral Engagement:

- Continue collaborative efforts in international forums to address global challenges like climate change, sustainable development, and public health. Advocate for reforms in international organizations to better represent the interests of developing nations.

## 2.11   SHORT ARTICLES

# Gujral Doctrine of Foreign Policy

### Context

- Recently, the 11th death anniversary of the precursor of the Gujral doctrine, IK Gujaral, the 12th Prime Minister of India was marked on November 30.
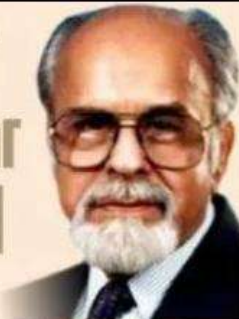
### Details

- He is the only Prime Minister with a foreign policy approach identified with his name the Gujral Doctrine.



**Inder Kumar Gujral**

Born: 4 December 1919 (age 92) Jhelum, Punjab (now in Pakistan)
Political party: Janata Dal (1988–2012)
Other political affiliations: Indian National Congress (Before 1988)
Alma mater: Forman Christian College

1931: Took part in the freedom struggle
1942: Jailed during the Quit India Movement
1945: Gets married
1959-64: Vice-President, New Delhi Municipal Council
1964-76: Member, Rajya Sabha (two terms)
1967-69: MoS, Parliamentary Affairs and Communications
1969-71: MoS, I&B and Communications
1971-72: MoS, Works, Housing and Urban Dev.
1972-75: MoS, Information and Broadcasting

1975-76: MoS, Planning
1976-80: Ambassador to U.S.S.R.
1989: Elected to the 9th Lok Sabha
1989-90: Minister, External Affairs
1992-98: Member of Rajya Sabha (3rd term)
1993-96: Chairman, Committee on Commerce and Textiles
1996-97: Minister, External Affairs
1996(June): Union Cabinet Minister, Water Resource
1997(April): Prime Minister of India
1998: Re-elected to 12th Lok Sabha (2nd term)
1999: Retired from active Politics

Death: November 30, 2012

- Inder Kumar Gujral was sworn in as the 12th Prime Minister of India from April 1997 to May 1998.

### About Gujral Doctrine:

- The Gujral Doctrine, outlined in a speech at Chatham House in London in September 1996, reflects a set of principles guiding India's approach toward its neighbors, particularly in South Asia.

- **The doctrine consists of five basic principles that emphasize goodwill, non-interference, and peaceful bilateral relations:**

**Unilateral Assistance:**

- India, being surrounded by neighboring countries such as Nepal, Bangladesh, Bhutan, Maldives, and Sri Lanka, commits to offering assistance without seeking reciprocity. The emphasis is on providing support guided by goodwill and trust.

**Non-Tolerance of Terrorism:**

- South Asian nations agree not to tolerate the use of their territory to harm the interests of another country in the region. This principle aims to address concerns related to cross-border terrorism and the use of territory for activities that could be detrimental to regional stability.

**Non-Interference in Internal Affairs:**

- The doctrine underscores the principle of non-interference in the internal affairs of another country. Each South Asian nation commits to respecting the sovereignty and autonomy of its neighbors.

**Respect for Territorial Integrity and Sovereignty:**

- All South Asian countries are expected to respect each other's territorial integrity and sovereignty. This principle emphasizes the importance of acknowledging and respecting national borders.

**Peaceful Dispute Resolution:**

- Nations commit to settling all their disputes through peaceful bilateral negotiations. The emphasis is on diplomatic dialogue and conflict resolution without resorting to aggression or violence.

# International Social Security Association

## Context

- The Employees' State Insurance Corporation (ESIC) bagged the International Social Security Association (ISSA) Vision Zero 2023" Award at the 23rd World Congress on Safety and Health at Work in Sydney, Australia.



## Details:

- ESIC was awarded "ISSA Vision Zero 2023" as it had great success in outreach in the field of safety and health at workplaces.
- ESIC has achieved this by aligning the prevention strategy besides the post-accidental mechanism for medical care and cash benefits to the workers and their dependents.
- The award underlines the improvements that have been made in the service delivery of the ESI Corporation as well as an increase in its administrative and operational efficiency using IT-enabled initiatives.

## About the International Social Security Association (ISSA):

### About

- The International Social Security Association (ISSA) is the principal international institution bringing together social security agencies and organizations of the world.

### Aim

- The vision of dynamic social security provides a framework for the ISSA's actions.

### Purpose

- The ISSA aims to promote dynamic social security as the social dimension in a globalizing world by supporting excellence in social security administration.

### Establishment and Headquarters

- Founded in 1927, the ISSA has its headquarters at the International Labour Office in Geneva.

### Role

- The ISSA provides access to information, expert advice, business standards, practical guidelines, and platforms for members to build and promote dynamic social security systems worldwide.

# Germany's Debt Brake Rule

## Context

- In Germany, the federal government and the 16 federal states are obliged to balance their books, and are practically prohibited from taking out extra loans.

## Details:

- No other G7 country has such strict limits on new borrowing.
- The rules are enshrined in the Basic Law, i.e. the German constitution, and apply — with minor differences — both at federal level and in the 16 states (known as Länder).



Germany's Deficit Is Set to Widen This Year
Source: German statistics office, government estimate
Bloomberg

- **Article 109 of the Basic Law, paragraph 3, states:** *"The budgets of the Federation and the Länder shall, in principle, be balanced without revenue from credits." This means that the state may only spend as much money as it takes in, primarily from taxes and levies. This requirement is known colloquially as the "debt brake."*
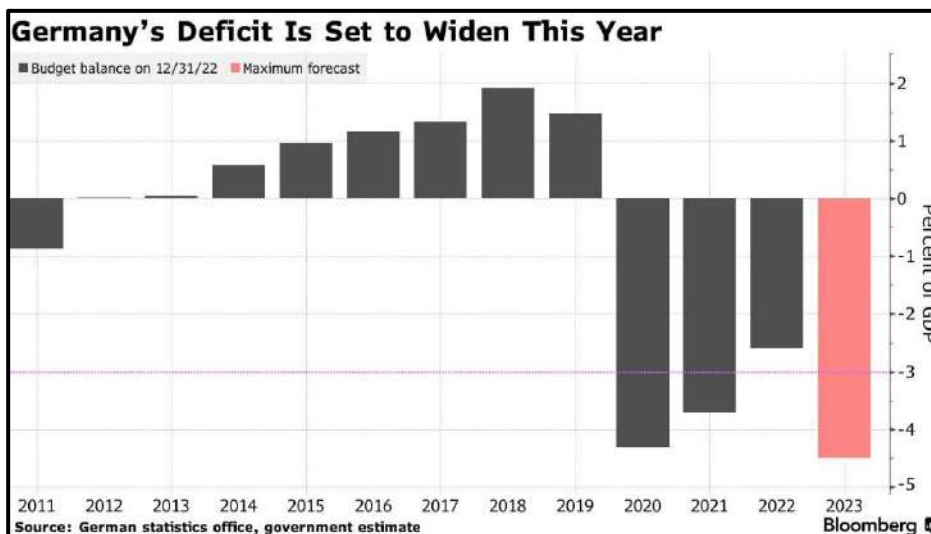
## About Debt Brake Rule:

### About

- The Debt Brake Rule is a fiscal policy mechanism implemented in Germany to regulate government borrowing and control the federal government's fiscal deficit.
- **Enacted in 2009**, this rule places a cap on the **fiscal deficit at 0.35% of the Gross Domestic Product (GDP).**

### Purpose of the Debt Brake Rule

- **The primary objective of the Debt Brake Rule** is to ensure fiscal discipline and sustainability within the German government's financial practices.
- **By limiting the fiscal deficit to 0.35% of the GDP**, the rule aims to prevent excessive government borrowing, promote responsible fiscal management, and maintain economic stability.
- **Additionally, the restriction on deficit spending by regional entities** contributes to overall fiscal prudence at both federal and regional levels.

### Enactment and Legislative Background

- The Debt Brake Rule was incorporated into German law in **2009** through legislative measures.
- **This enactment reflected a strategic alignment with the European Union's Stability** and Growth Pact, which outlines fiscal rules for EU member states, and the 2012 Fiscal Compact Treaty.
- **The integration of the Debt Brake Rule into German legislation** underscores the country's commitment to adhering to broader European fiscal standards and fostering financial responsibility.

# Interpol General Assembly

## Context

- Recently, the Indian delegation, led by the Central Bureau of Investigation (CBI) and National Investigation Agency (NIA), urged member countries to deny safe havens to crime, criminals, and the proceeds of crime at the 91st Interpol General Assembly held in Vienna, Austria.



## Details:

- A high-ranking Indian delegation to the **91st Interpol General Assembly** has urged other member countries to deny safe havens to crime, criminals, and the proceeds of crime.
- The delegation was led by **Central Bureau of Investigation (CBI)** director Praveen Sood and includes **National Investigation Agency (NIA)** director-general Dinkar Gupta.

## Key Resolutions at the 91st Interpol General Assembly

- **The 91st Interpol General Assembly** witnessed the passage of pivotal resolutions aimed at bolstering international collaboration in the fight against diverse forms of crime.
- These resolutions underscored a commitment to **disrupting financial crime and corruption, combating online child sexual exploitation**, and promoting diversity within the Interpol organization.

## Collaborative Response to Financial Crime and Corruption

- Delegates at the assembly emphasized the need for a **unified response to financial crime and corruption**.
- Resolutions were passed to strengthen collaborative efforts, fostering a coordinated global approach to tackling these pervasive issues.

## Combating Online Child Sexual Exploitation

- **Recognizing the urgency of addressing online child sexual exploitation**, the assembly resolutions highlighted a concerted effort to combat this heinous crime.
- **Strategies for enhanced cooperation among member countries** were discussed to effectively counter the evolving challenges in cyberspace.
- **Promoting Diversity within Interpol**
  Acknowledging the importance of diversity, the assembly resolutions aimed at promoting inclusivity within the Interpol organization.
- **The focus was on creating a more representative** and diverse environment to strengthen the organization's capabilities in addressing global security challenges.

## Coordinated Strategies Against Various Crimes

- Delegations engaged in substantive discussions with law enforcement agencies from diverse countries, formulating coordinated strategies to combat **organized crime, terrorism, drug trafficking, money laundering, online radicalization**, and cyber-enabled financial crimes.

## Advocacy for Real-Time Crime Prevention

- A crucial aspect of the assembly discussions centered around the advocacy for real-time prevention of crimes.
- **Delegates underscored the importance of proactive measures** to prevent and deter criminal activities, emphasizing the role of timely intervention in maintaining global security.

### Support for Interpol's Vision 2030

- The assembly saw strong support for **Interpol's Vision 2030**, a strategic roadmap for the organization's future.
- Delegates recognized the importance of aligning efforts with this vision to address emerging threats and challenges effectively.

### Establishment of Interpol Future Council

- In a forward-looking move, the delegation supported the establishment of the **Interpol Future Council**.
- This initiative aims to provide a platform for ongoing dialogue and strategic planning, ensuring that Interpol remains adaptive and responsive to the evolving landscape of global security.

# Operation Storm Makers II

### Context

- Recently, Interpol has conducted a major operation called Operation Storm Makers II.

### Details:

- According to the Interpol, the Telangana Police registered one of the first cases in India of human trafficking committed for the purpose of forcing victims to commit cyber fraud.

### International Operation Nets 281 Arrests Across Multiple Countries

- In a collaborative effort involving Indian enforcement agencies, a successful operation has led to the apprehension of 281 individuals globally. The charges against these individuals span a range of offenses, including human trafficking, passport forgery, corruption, telecommunications fraud, and sexual exploitation.

### Interpol's Prior Warning on Trafficking Victims in Cyber Fraud

- This operation shed light on a disturbing trend that Interpol first brought to attention in June—an alarming intersection of human trafficking victims coerced into cyber fraud. Interpol's revelation highlighted the global scale of this issue, with scam syndicates generating billions of dollars in annual revenue.

### Key Achievements of the Operation

- The operation, which specifically targeted human trafficking and cyber scams, yielded significant results:
- **Rescue of 149 Human Trafficking Victims**: The coordinated efforts led to the successful rescue of 149 individuals who had fallen victim to human trafficking.
- **Hundreds of Arrests**: A total of 281 arrests were made, underscoring the international scope of the criminal networks involved in these illicit activities.
- **Over 270,000 Inspections and Police Checks**: The operation involved extensive scrutiny, with more than 270,000 inspections and police checks conducted to identify and apprehend those involved in the various criminal activities.

# Tax Inspectors without Borders

### Context

- TIWB is a joint initiative of the United Nations Development Programme (UNDP) and the Organisation for Economic Cooperation and Development (OECD).

### Details:

- Tax Inspectors Without Borders (TIWB), a joint initiative of the United Nations Development Programme (UNDP) and the Organisation for Economic Cooperation and Development (OECD), launched a program in Saint Lucia on 14th December 2023.

- India has been chosen as the Partner Administration and will provide Tax Experts for this program.

## About Tax Inspectors without Borders:

### About

- Tax Inspectors Without Borders (TIWB) is a collaborative initiative between the Organisation for **Economic Co-operation and Development (OECD) and the United Nations Development Programme (UNDP).**
- The program is designed to bolster tax audit capabilities in developing countries, supporting their efforts in domestic resource mobilization.

### Purpose

- The primary goal of TIWB is to provide targeted and specialized **assistance in tax audits to developing nations worldwide.**
- This initiative aligns with broader **international endeavors to enhance collaboration** on tax matters, contributing significantly to the domestic resource mobilization endeavors of developing countries.

### Implementation

- **Under TIWB, tax audit experts collaborate** closely with local officials from tax administrations in developing countries.
- **The focus is on addressing tax audits and related issues**, ensuring a transfer of technical knowledge and skills.
- The **collaborative approach involves shared general audit practices** to strengthen the overall audit capabilities of developing countries.

### Key Features

- **Specialized Assistance:** TIWB offers well-targeted assistance, tailoring support to the specific needs and challenges faced by developing countries in the realm of tax audits.
- **Capacity Building:** The program aims to enhance the capacities of tax auditors in developing nations by facilitating hands-on collaboration with international experts. This includes the transfer of technical know-how and the adoption of best practices.

- **Global Cooperation:** TIWB operates as a manifestation of global cooperation, emphasizing the importance of shared efforts in addressing the complexities of tax matters.
- **Domestic Resource Mobilization:** By strengthening tax audit capabilities, TIWB contributes significantly to the broader goal of domestic resource mobilization in developing countries.

# Visa-free Travel for Indian citizens in Iran

## Context

- Iran has announced that it was lifting visa requirements for citizens of India as well as 32 other countries.

## Details:

- Iran has announced the removal of visa requirements for Indian citizens and nationals from 32 other countries.
- The decision is aimed at increasing tourism and improving global perceptions of Iran.

## About Iran's Visa-Free Travel Initiative

### Countries Included:

- Iran has introduced a visa-free travel initiative for an extensive list of countries, **encompassing Russia, UAE, Bahrain, Saudi Arabia, Qatar, Kuwait, Lebanon**, several Central Asian and African nations, **Japan, Singapore, Southeast Asian countries, and select countries in Latin America and Europe.**

### Previous Visa Exemptions:

- Before this initiative, Iran had already waived visa requirements for **Türkiye, Azerbaijan, Oman, China, Armenia, Lebanon, and Syria.**

### Tourist Influx Statistics:

- The implementation of the visa-free policy has resulted in a substantial increase in tourism, with Iran experiencing a notable 48.5% rise in tourist numbers. In the first eight months of the current Iranian year, **the country welcomed 4.4 million** tourists.

## Proposal for Wider Visa-Free Travel

### Ministry's Initial Proposal:

- The Ministry of Cultural Heritage, Tourism, and Handicrafts initially proposed visa-free

travel for 60 countries. However, the proposal has not been fully approved as yet.

### Umrah Flights to Saudi Arabia:

- Commencing December 19, Iranians gained the opportunity to travel to Saudi Arabia for Umrah, marking the first such opening in eight years.

### India's Growing Outbound Tourism Market

### Current Visa-Free Countries:

- India's outbound tourism market has expanded, with citizens **enjoying visa-free entry to 27 countries**. Recent additions include **Kenya, Indonesia, Malaysia, Thailand, and Sri Lanka.**

### Popular Destinations for Indian Citizens:

- The top five travel destinations for Indian citizens include the **UAE, the USA, Saudi Arabia, Singapore, and Thailand.** Many travel to these destinations as part of the diaspora.

- This global movement toward visa exemptions reflects a shift in diplomatic relations and an increased focus on promoting tourism and cultural exchange between nations.

# Organization of Islamic Cooperation

### Context

- The OIC had expressed concern over the apex court order, which on Monday, ruled that Article 370 was a temporary provision.

### Details

- India has rejected a statement issued by the General Secretariat of the Organization of Islamic Cooperation (OIC) on a judgment of the Supreme Court upholding the abrogation of Article 370 that guaranteed special status to Jammu and Kashmir.

### About the Organization of Islamic Cooperation (OIC):

- The Organization of Islamic Cooperation (OIC) stands as the second-largest international organization, comprising 57 member states across four continents. Serving as the collective voice of the Muslim world, it aims to promote international peace and harmony while safeguarding the interests of its diverse membership.

- **Background:** Established in response to the criminal arson of **Al-Aqsa Mosque in Jerusalem**, the OIC was formed during a historic summit in **Rabat, Kingdom of Morocco, on September 25, 1969**. The inaugural Islamic Conference of Foreign Ministers (ICFM) in 1970 led to the creation of a permanent secretariat in **Jeddah, with a Secretary-General at its helm**.



What is OIC?

OIC- Organization of the Islamic Cooperation

It was founded in **1969**

First OIC Charter Adopted in **1972**

Number of Member Countries **57**

Founding Members **30**

Key Bodies of OIC:
➤ Council of Foreign Ministers
➤ General Secretariat
➤ Islamic Summit
➤ Al-Quds Committee

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### Major Objectives:

- **Solidarity Among Member States:** The OIC strives to foster solidarity among its member states, promoting unity and cooperation.

- **Sovereignty and Territorial Integrity:** It supports the restoration of complete sovereignty and territorial integrity for any member state under occupation.

- **Defending Islam:** The organization is committed to protecting, defending, and combating the defamation of Islam globally.

- **Preventing Dissention:** To prevent growing dissension within Muslim societies, encouraging a united stand at international forums like the U**.N. General Assembly and Human Rights Council**.
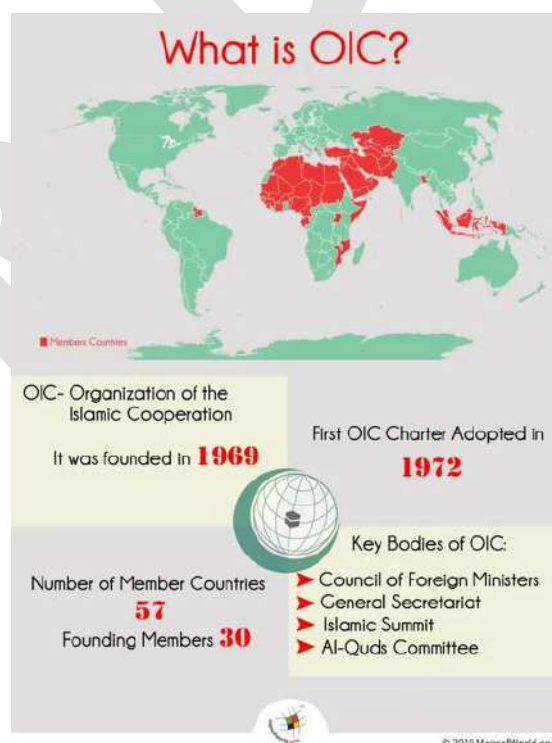
- **Charter:** The OIC operates under a charter that outlines its objectives, principles, and mechanisms. Initially adopted in 1972, the charter has undergone multiple revisions, with the latest version adopted in **March 2008 in Dakar, Senegal**. It emphasizes adherence to Islamic teachings and values, aligning with the principles of the U.N. charter.

### Membership:

- **Permanent Members:** Afghanistan, Algeria, Bangladesh, Brunei Darussalam, Burkina Faso, Djibouti, Egypt, Gabon, Gambia, Guinea, Indonesia, Iran, Iraq, Jordan, Morocco, Mozambique, Niger, Nigeria, Oman, Pakistan, Palestine, Qatar, Saudi Arabia, Senegal, Somalia, Sudan, Syria, Tajikistan, Turkey, Tunisia, Turkmenistan, United Arab Emirates, Uzbekistan, Yemen, and others.
- **Observer Members (States):** Bosnia and Herzegovina, Central African Republic, Kingdom of Thailand, The Russian Federation, Turkish Cypriot State.
- **Observer Members (International Organizations):** United Nations (UN), Non-Aligned Movement (NAM), League of Arab States (LAS), African Union (AU), Economic Cooperation Organization (ECO).

# North Atlantic Treaty Organization

## Context

- A key committee in the Turkish parliament on Tuesday gave the green light for Sweden's NATO membership, clearing another hurdle in the Nordic country's accession process in the wake of Russia's invasion of Ukraine last year.



## Details

- The Turkish parliament's foreign affairs committee approved Sweden's NATO membership 19 months after it submitted the plan.
- The move paves the way for a vote by the full Parliament, where President Recep Tayyip Erdogan's alliance has a majority. It was not immediately clear when it would be.
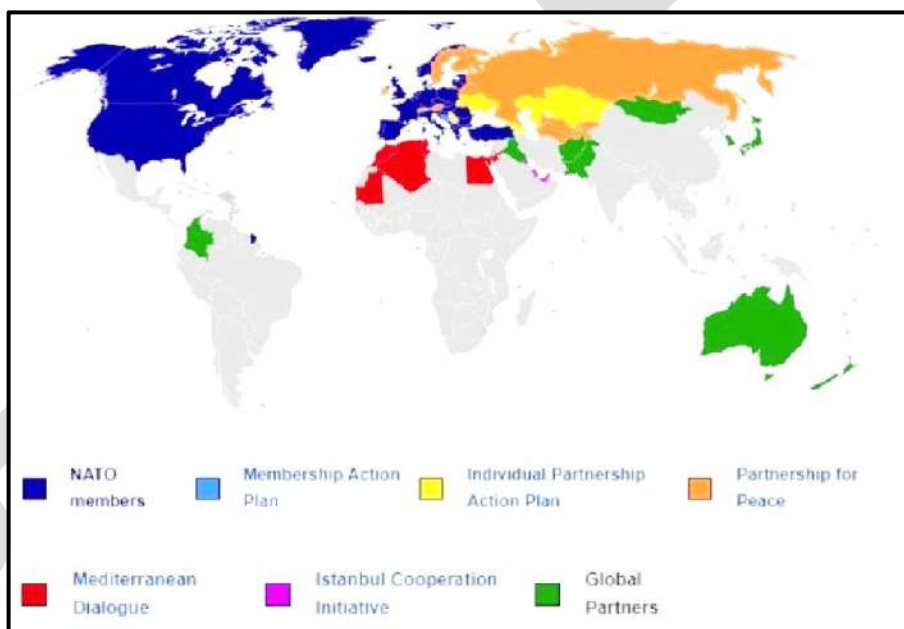
## About the North Atlantic Treaty Organization:

### About

- **NATO is integral** to permanently tying together the security of **North America and Europe. Its enlargement aligns with the U.S. goal of fostering a Europe** that is whole, free, and at peace.
- **Article 4 ensures consultations among Allies** on evolving security matters, expanding from the Soviet threat to contemporary challenges like cyber attacks, terrorism, and piracy.

### Purpose

- **Established in 1949 through the Washington Treaty, NATO** is a security alliance aimed at safeguarding the freedom and security of its Allies through political and military means.
- Serving as the primary security instrument for the transatlantic community, NATO upholds common democratic values.

**Member States**

- **Comprising 30 member** states from **North America and Europe, NATO** operates under the principle of collective defense outlined in **Article 5.**
- If one member faces an armed attack, it is considered an attack against all members, invoking mutual assistance with armed forces if necessary.

**Organizational Structure**

- **NATO consists of two main components**—political and military. The NATO Headquarters serves as a venue for representatives from all member states to make decisions on a consensus basis.
- It fosters dialogue and cooperation between partner and member countries, fostering joint efforts for peace and stability.

**NATO Military Exercises**

- **NATO Military Exercises** encompass a range of activities initiated by NATO, including seminars, study periods, and workshops.
- **Scheduled by a NATO Commander**, these exercises aim to establish, enhance, and demonstrate NATO's military capability across a broad mission spectrum.

**Promoting Democratic Values and Conflict Prevention**

- **NATO plays a crucial role in promoting democratic values**, encouraging consultation, and fostering cooperation on defense and security issues to build trust and prevent conflicts.
- **Committed to peaceful dispute resolution,** NATO possesses the military capacity for crisis-management operations if diplomatic efforts fail.

**Historical Significance**

- Throughout its history, **Article 5 of the NATO treaty** has been invoked only once, in response to the **9/11 terrorist attacks in the United States.**
- This underscores NATO's role as a resilient alliance capable of adapting to evolving threats and challenges.

# Angola leaves OPEC

**Context**

- Angola has opted to withdraw from the Organization of the Petroleum Exporting Countries (OPEC) due to a disagreement concerning oil production quotas.
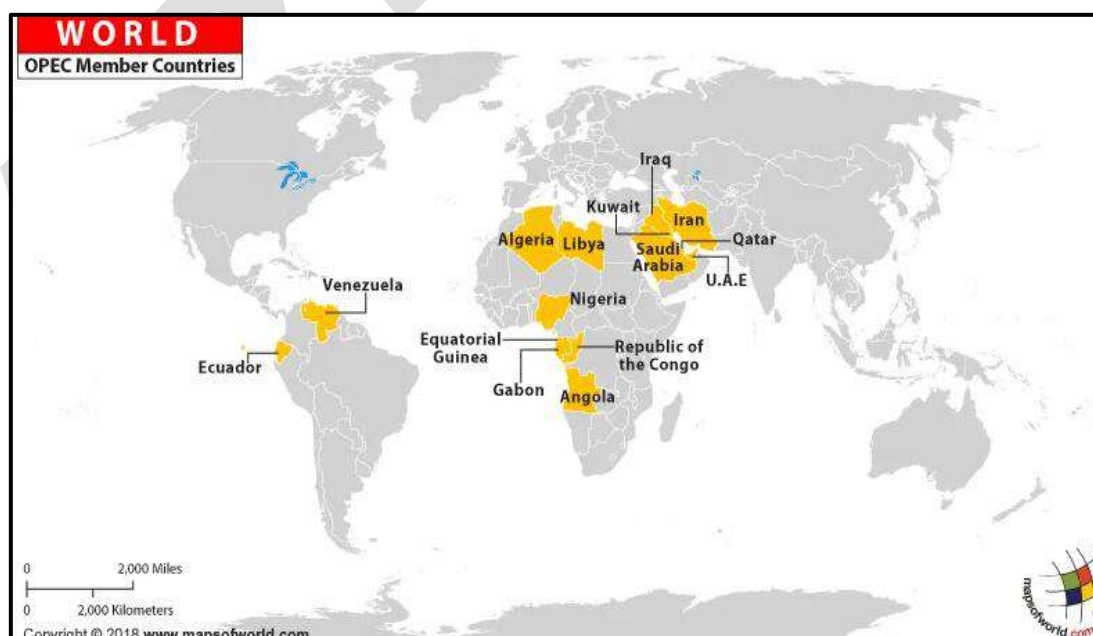
**Details:**
- Several other members have quit the group in recent years, for different reasons: Qatar, Indonesia, and most recently, Ecuador.
- Angola**, having joined OPEC in 2007**, now finds itself at odds with the recent production cut decision. This dissenting stance echoes the sentiments expressed by other former OPEC members such as Ecuador, Indonesia, and Qatar.
- Angola's departure from the cartel follows a trend of nations choosing to step away, diminishing OPEC's membership to 12 countries.

## About the Organization of the Petroleum Exporting Countries (OPEC):
- OPEC, the Organization of the Petroleum Exporting Countries, emerged in **1960 in Baghdad as an international coalition** dedicated to fostering collaboration on oil production and pricing policies.
- The organization's **headquarters is situated in Vienna, Austria**.

**Membership:**
- **Comprising 13 member countries**, OPEC's roster includes nations such as Algeria, Angola, Equatorial Guinea, Gabon, Iran, Iraq, Kuwait, Libya, Nigeria, the Republic of the Congo, Saudi Arabia, the United Arab Emirates, and Venezuela.

**Objective:**
- **OPEC's primary objective is to harmonize and consolidate petroleum policies** among its member nations.
- This strategic alignment aims to ensure equitable and stable oil prices, providing a consistent income for oil-producing countries while securing a reliable supply for global consumers.

**Decision-Making Process:**
- **Operating on the principle of consensus**, OPEC facilitates major decision-making through negotiations and agreement among its member nations.
- This collaborative approach extends to crucial determinations on production quotas and pricing policies.

**Production Quotas:**
- A **key tool in controlling global oil supply and stabilizing prices**, OPEC establishes production quotas for its member countries.
- These quotas are intricately tailored to each **nation's production capacity and market share**, contributing to market equilibrium.

**Influence and Impact:**
- Throughout its history, OPEC has wielded substantial influence in the global oil market.
- The collective output and reserves of its **member countries significantly contribute to OPEC's pivotal role** in shaping global oil dynamics.

# Project PRAYAS

## Context
- The International Organisation for Migration (IOM) launched Project PRAYAS (Promoting Regular & Assisted Migration for Youth and Skilled Professionals).

## Details:
- The International Organisation for Migration (IOM) launched Project PRAYAS on Thursday to help Indian workers and students migrate in a secure, orderly, and regular manner.

- The project PRAYAS, or Promoting Regular Assisted Migration for Youth and Skilled Professionals, was launched in partnership with the Ministry of External Affairs (MEA).
- **Established in 1951, IOM is a United Nations (UN) agency** dedicated to promoting humane and orderly migration.

## About the Project PRAYAS:
- **Collaborative Partnership:** Project Prayas marks a significant collaboration between the International Organization for Migration (IOM) in India and the Indian Council of World Affairs (ICWA).

- **Goal:** The primary objective of Project Prayas is to facilitate safe, orderly, and regular migration for Indian workers and students, thereby contributing to the strengthening of international migration governance.
- **Global Diaspora Status:** With a global diaspora exceeding 32 million, encompassing Indians and people of Indian origin, the project addresses the challenges and opportunities associated with their residence abroad.
- **Enhanced Coordination:** A key focus of Project Prayas is the development of a comprehensive roadmap to improve coordination between Central and State Governments. This initiative aims to foster the sharing of best practices related to migration management.
- **Consolidation of Initiatives:** The project aims to consolidate various state-level initiatives, fostering a cohesive approach to ensure the safety and orderliness of international migration.
- **Engagement with MEA:** Through Project Prayas, there is an envisioned enhancement of engagement with the Ministry of External Affairs (MEA) on matters integral to the international migration cycle.
- **Alignment with SDG:** Project Prayas aligns closely with Goal 10.7 of the 2030 Agenda for Sustainable Development Goals (SDGs), focusing on facilitating orderly, safe, regular, and responsible migration and mobility of people.
- **Adherence to Global Standards:** The project adheres to the objectives outlined in the Global Compact for Safe, Orderly, and Regular Migration (GCM) and the Migration Governance Framework (MiGOF), ensuring a commitment to global standards in migration management.

## 2.12   SNIPPETS

### Article 99 of the UN Charter

- It's a special power, and the only independent political tool given to the secretary-general in the UN Charter.
- It allows him to call a meeting of the Security Council on his initiative to issue warnings about new threats to international peace and security and matters that are not yet on the council's agenda.
- In Article 99, the charter states, "the Secretary-General may bring to the attention of the Security Council any matter which in his opinion may threaten the maintenance of international peace and security".

## 2.13   1 MAINS & 5 MCQs

*Q1. ASEAN is a key pillar of India's 'Act East policy', what does it mean for the region? Also, shed the role of the East Asia Summit in the Indo-Pacific and the ongoing Geopolitical churn.*

**Introduction:**
India's 'Act East Policy' places ASEAN (Association of Southeast Asian Nations) as a crucial pillar, reflecting the strategic importance of fostering stronger ties with the Southeast Asian region. This policy signifies India's commitment to deepening its engagement with ASEAN nations, not only for economic reasons but also for strategic and geopolitical considerations.

**Body:**
**Significance of ASEAN in 'Act East Policy':**
- The inclusion of ASEAN in India's 'Act East Policy' is pivotal for regional stability and economic growth.
- It emphasizes India's intent to strengthen economic, cultural, and strategic bonds with Southeast Asian nations.

- Collaborative efforts in trade, investment, and connectivity projects enhance India's presence in the region and contribute to the overall prosperity and security of Southeast Asia.

## Role of East Asia Summit (EAS) in the Indo-Pacific:

- The East Asia Summit, with ASEAN as its core, plays a central role in the evolving geopolitical landscape of the Indo-Pacific.
- It serves as a platform for dialogue and cooperation among key stakeholders, fostering diplomatic engagement and addressing security challenges.
- As the Indo-Pacific witnesses geopolitical shifts and power realignments, the EAS provides a forum for constructive discussions aimed at maintaining peace, stability, and economic growth in the region.

## Ongoing Geopolitical Churn:

- The ongoing geopolitical churn in the Indo-Pacific, marked by heightened strategic competition, underscores the relevance of platforms like the East Asia Summit.

- As major powers vie for influence, the EAS becomes a crucial arena for dialogue, conflict resolution, and the promotion of a rules-based order.
- India's active participation in the EAS reflects its commitment to shaping the geopolitical narrative in a manner that ensures inclusivity, respect for international law, and sustainable development.

## Conclusion:

- The integration of ASEAN into India's 'Act East Policy' and the role of the East Asia Summit are instrumental in navigating the ongoing geopolitical churn in the Indo-Pacific. These diplomatic initiatives not only strengthen India's ties with Southeast Asia but also contribute to regional stability and cooperation. As the geopolitical landscape continues to evolve, collaborative forums like the EAS serve as vital mechanisms for dialogue and consensus-building among nations with shared interests in the Indo-Pacific region.

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*Q2. Consider the following statements:*
1. LIC bagged the International Social Security Association (ISSA) Vision Zero 2023.
2. ISSA aims to promote dynamic social security as the social dimension in a globalizing world.
3. Founded in 1927, the ISSA has its headquarters at the International Labour Office in Geneva.

**Which of the above statements is/are incorrect?**
A) 1 and 2 only
B) 1 only
C) 3 only
D) 1, 2 and 3

*Q3. Consider the following statements:*
1. Tax Inspectors Without Borders (TIWB) is a joint initiative of the Organisation for Economic Co-operation and Development (OECD) and the United Nations Development Programme (UNDP).

2. TIWB aims to transfer technical know-how and skills to developing countries' tax auditors, as well as shared general audit practices.

**Which of the above statements is/are correct?**
A) 1 only
B) 2 only
C) Both 1 and 2
D) Neither 1 nor 2

*Q4. Which of the following statements with reference to NATO is/are correct?*
1. If an armed attack occurs against one of the member states, it should be considered an attack against all members.
2. It is a strategic alliance of 30 countries.
3. Finland and Sweden are members of NATO.

**Which of the above statements is/are correct?**
A) 1 and 2 only
B) 1 only
C) 3 only

D) 1, 2 and 3

**Q5. Consider the following statements regarding India's relations with Asian countries:**

1. India is a founding member of the Shanghai Cooperation Organization (SCO).
2. The Act East Policy, initiated by India, aims to strengthen economic and strategic ties with Southeast Asian nations.
3. India is a member of the Asia-Pacific Economic Cooperation (APEC) forum.

**Which of the above statements is/are correct?**

A) 1 only
B) 2 and 3 only
C) 1 and 2 only
D) All of the above

**Q6. Consider the following statements about India-New Zealand relations:**

1. India and New Zealand are both members of the Commonwealth of Nations.
2. The Comprehensive Economic Cooperation Agreement (CECA) serves as the primary framework for economic cooperation between India and New Zealand.
3. Both countries have a history of collaboration in sectors such as education and agriculture.

**Which of the above statements is/are correct?**

A) 1 only
B) 2 and 3 only
C) 1 and 3 only
D) All of the above

**ANSWERS: 2) B, 3) C, 4) A, 5) C, 6) C**

# 3. ECONOMY

## 3.1 COTTON SECTOR IN INDIA

### Context

- The Union Minister for Textiles, Commerce and Industry has outlined India's ambitious goals and strategies within the textile industry, particularly in cotton production, export, and technological advancements.

### Details

- India is already a significant player in cotton cultivation and production, holding the second-largest producer position globally. The Minister emphasized India's desire to become the world's largest cotton producer, leveraging its vast area under cotton cultivation.

#### Strategies for Growth

- India aims to enhance productivity levels in cotton cultivation, drawing inspiration from countries like Australia that have achieved high productivity.
- The country is focused on assuming leadership in cotton textiles and technical textiles, with advisory groups dedicated to both cotton and manmade fibres.
- Advisory groups with representation across the textile value chain will help make informed policy decisions.
- Initiatives like **PM MITRA aim to establish mega textile parks** and promote the entire value chain of textiles.
- The **Indian textile industry is striving to achieve $250 billion by 2030, with $100 billion coming from exports.**

**Cotton**
- Cotton crops require a minimum of 16°C of daily temperature to germinate, but it grows best in a range of 21°C to 27°C.
- It needs a long growing season of at least 180 days without frost, and preferably more than 200 days, to allow the balls to fully mature.
- The rainfall must be well distributed throughout the season, between 55-100 cm in total, as too much or too little water can affect its growth and quality.
- Cotton prefers fertile loamy soil that drains well and has good aeration, such as the black soil found in the Deccan trap region in India.

### Cotton Sector in India

- The cotton sector is the second most advanced sector in the Indian textile industry, after man-made fibres.
- The **main cotton-growing states in India are Gujarat, Maharashtra, Andhra Pradesh**, Haryana, Punjab, Madhya Pradesh, Rajasthan, Karnataka, and Tamil Nadu.
- **It is a key input for the textile and apparel sector**, which is one of the largest and fastest-growing sectors in India. It also supports other industries such as oilseeds, fertilizers, pesticides, machinery, transport, and trade.

#### Background

- Cotton cultivation in India dates back to the Indus Valley Civilization (around 2500 BCE).



**State-wise production of cotton**

Gujarat 35%, Maharashtra 21%, Andhra Pradesh 14%, Haryana 8%, Punjab 7%, Madhya Pradesh 6%, Rajasthan 4%, Karnataka 3%, Others 2%

*Source: Ministry of Agriculture, GoI*

- India was a major exporter of cotton textiles to Europe, Asia, and Africa until the 18th century.

- The British colonial rule disrupted the cotton industry in India by imposing heavy taxes, tariffs, and restrictions on Indian cotton products.
- The cotton industry in India revived after independence with the establishment of modern mills, cooperatives, and research institutes.
- India is now the world's largest producer of cotton and the second most developed sector in the textile industry (after man-made fibres).

## Significance

- India's prominence in the global cotton market is substantial due to its sheer scale of production and acreage. With **approximately 36% of the world's total cotton acreage, India holds the largest share**. This vast cultivation translates into around **18% of the global cotton output.**
- The cotton sector is a significant contributor to India's economy, providing livelihoods to millions of individuals directly and indirectly involved in cultivation, processing, and manufacturing. Additionally, cotton exports significantly contribute to the country's foreign exchange earnings.

## Steps taken by India

- The Technology Mission on Cotton (TMC) is to improve the productivity, quality, and competitiveness of cotton.
- The Minimum Support Price (MSP) to ensure remunerative prices for farmers.
- The Cotton Corporation of India (CCI) procures and markets cotton at MSP or market prices.
- The Technology Upgradation Fund Scheme (TUFS) provides subsidies for the modernization and expansion of textile units.
- The Integrated Skill Development Scheme (ISDS) to train workers in various skills related to textiles.
- The Scheme for Integrated Textile Parks (SITP) provides infrastructure and common facilities for textile clusters.
- The Amended Technology Upgradation Fund Scheme (ATUFS) promotes technical textiles and value-added products.

## Challenges

- **Low productivity and quality** due to factors such as pests, diseases, droughts, floods, climate change, poor seeds, inadequate irrigation, and outdated technology.
- **High cost of production and low profitability** due to factors such as rising input prices, labour shortages, market fluctuations, trade barriers, and competition from synthetic fibres.
- **Environmental and social issues** such as water scarcity, soil degradation, pesticide pollution, health hazards, farmer suicides, child labour, and gender inequality.

## Way forward

- **Adopting sustainable and organic farming practices** such as crop rotation, intercropping, mulching, bio-fertilizers, bio-pesticides, rainwater harvesting, drip irrigation, and soil conservation.
- **Promoting research and innovation** in areas such as seed development, Biotechnology, nanotechnology, smart textiles, digital printing, and automation.

- **Strengthening the value chain linkages among farmers**, ginners, spinners, weavers, dyers, processors, designers, retailers, and consumers.
- **Enhancing the quality standards and certification systems** for cotton products to meet the domestic and international market requirements.
- **Diversifying the product portfolio and export destinations for cotton products** to tap into new opportunities and reduce dependence on a few markets.
- **Strengthening farmer cooperatives, ensuring access to information and technology**, and facilitating fair market access are crucial for sustainable growth and improving the livelihoods of those involved in the sector.

## 3.2    BIOECONOMY

### Context
- The Union Health Minister stated that the Bio-Economy, encompassing sectors such as Bio Agriculture, Bio Pharmaceuticals, and Bio Services, has surged from $10 billion to $80 billion during the last decade.

### Bio-Economy
- It is a term that refers to the **economic activity that involves the use of biotechnology and biomass in the production of goods, services, or energy.**
- It aims **to reduce the dependence on fossil resources, prevent biodiversity loss, and create new growth and jobs** that are in line with sustainable development.
- **It covers both the production and use of food and feed, as well as non-food goods such as bioplastics**, biodegradable clothing, and bio-based chemicals. It also encompasses the conservation and utilization of biological resources, such as crops, forests, fish, animals, and microorganisms.
- It relies on the knowledge, science, technology, and innovation that enable the study, manipulation, and application of biological processes and principles to various industrial sectors.
- **It is a key driver for the transition to a circular economy**, where waste and residual materials are reused, repaired, and recycled to minimize environmental impact and save energy.
- According to a report by Biotechnology Industry Research Assistance Council (BIRAC), **India's bioeconomy is likely to touch USD 150 billion by 2025 and over USD 300 billion by 2030.**
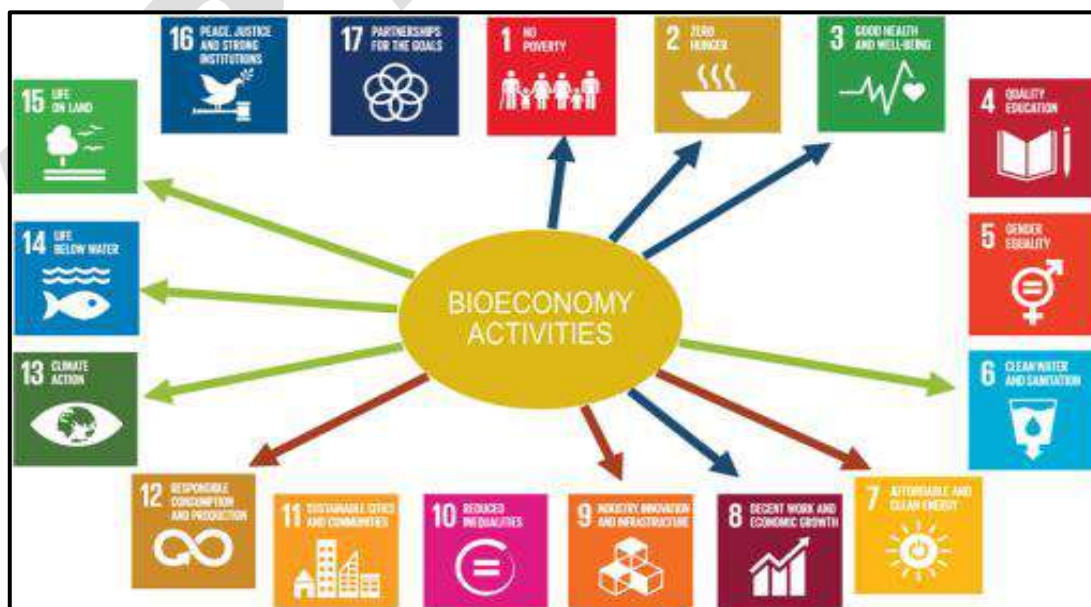
## Some of the key features of India's bio-economy

- It is **driven by innovation and entrepreneurship**, with over 4,000 biotech start-ups operating in various domains.
- It is **diversified and inclusive, covering a wide range of sectors and regions,** and providing employment and livelihood opportunities to millions of people.
- It is **aligned with the national priorities** of health, food security, energy security, environmental protection and social development.
- It is supported by a conducive policy framework and regulatory environment, with initiatives such as Make in India, Start-up India, Atmanirbhar Bharat, Biomedical Policy, BioIndustrial Policies and Biotech Policies in various states.
- It is collaborative and cooperative, with strong linkages among academia, industry, government and civil society.



## Significances

- It **contributes to the GDP growth and economic diversification of the country.**
- It enhances the competitiveness and resilience of the country in the global market.
- It addresses the social and environmental challenges faced by the country, such as poverty, malnutrition, disease burden, climate change and pollution.
- It **creates new opportunities for innovation, value addition and wealth creation**.
- It fosters human capital development and skill enhancement.

## India has taken several steps to promote and strengthen its bio-economy

- **Establishing the Biotechnology Industry Research Assistance Council (BIRAC)** as a public sector undertaking under the Department of Biotechnology (DBT) **to facilitate research funding, innovation support, incubation services and capacity building for the biotech sector.**

- Launching various schemes and programs under BIRAC such as the Biotechnology Ignition Grant (BIG), Small Business Innovation Research Initiative (SBIRI), Biotechnology Industry Partnership Programme (BIPP), Social Innovation Programme for Products: Affordable & Relevant to Societal Health (SIPP), Grand Challenges India (GCI) etc. to **support various stages of the biotech innovation cycle.**
- **Setting up bio-clusters, bio-incubators, bio-parks and bio-centres across the country** to provide infrastructure, facilities and mentorship for biotech start-ups and enterprises.
- **Developing a robust regulatory system for biotech products and processes**, with agencies such as the Central Drugs Standard Control Organization (CDSCO), Review Committee on Genetic Manipulation (RCGM), Genetic Engineering Appraisal Committee (GEAC), Food Safety and Standards Authority of India (FSSAI) etc. to ensure safety, efficacy and quality.

- **Participating in international collaborations and partnerships for biotech research and development**, such as Coalition for Epidemic Preparedness Innovations (CEPI), International Vaccine Institute (IVI), International Centre for Genetic Engineering and Biotechnology (ICGEB) etc. to leverage global expertise and resources.

## Challenges that need to be overcome

- **Lack of adequate funding and investment for biotech research and development**, especially for high-risk and long-term projects.
- **Lack of skilled human resources and a talent pool for the biotech sector**, especially in emerging areas such as synthetic biology, genome editing etc.
- **Lack of awareness and acceptance among the public and stakeholders** about the benefits and applications of biotechnology.
- **Lack of coordination and convergence among various ministries**, departments and agencies involved in the biotech sector.
- **Lack of harmonization and standardization** of biotech regulations across states and regions.

## Way forward

- **Increasing the public expenditure and private investment** for biotech research and development, especially for translational and applied research.
- **Enhancing the quality and quantity of human resources and talent pool** for the biotech sector, especially by strengthening the education and training system and creating attractive career opportunities.

- **Creating a positive and supportive public perception and stakeholder engagement** about the benefits and applications of biotechnology, especially by increasing the outreach and communication activities and addressing the ethical and social issues.
- **Improving the coordination and convergence** among various ministries, departments and agencies involved in the biotech sector, especially by creating a single-window clearance mechanism and a common platform for information sharing and decision-making.
- **Harmonizing and standardizing the biotech regulations across states and regions**, especially by adopting a risk-based and science-based approach and ensuring transparency and accountability.

## Conclusion

- India's bio-economy is one of the most promising and dynamic sectors of the country's economy. It has the potential to transform the country's development and growth trajectory, by providing sustainable, circular and innovative solutions for various challenges. India has taken several steps to promote and strengthen its bio-economy, but some challenges need to be overcome. India needs to adopt a holistic and strategic approach to harness the full potential of its bio-economy, by leveraging its strengths, addressing its gaps, and creating a conducive ecosystem for innovation and entrepreneurship.

## 3.3 NITI AAYOG's REPORT ON POVERTY

### Context

- The Union Finance Minister during her speech in Rajya Sabha quoted a Niti Aayog report claiming that 13.5 crore people moved out of "multidimensional" poverty in the last five years.

### Key Highlights of the Finance Minister's Speech

- The Union Finance Minister emphasized India's position as the fastest-growing major economy, with a 7.6% growth rate in the second quarter of 2023. She compared this favourably to the contraction experienced by other major economies like Germany and Japan.

- She highlighted the contribution of various sectors to economic growth. The service sector, software services, and manufacturing sector, aided by the Make in India and PLI schemes, were mentioned as key drivers.
- She emphasized the government's focus on infrastructure building, citing increased spending by states on capital assets. This suggests an attempt to address infrastructure bottlenecks and improve connectivity.
- She mentioned a 21.82% growth in direct tax collection and stabilized monthly GST collections at Rs 1.6 lakh crore as indicators of economic activity.
- She addressed concerns about unemployment, claiming a decline in the unemployment rate from 17.8% in 2017-18 to 10%. However, more details on the methodology used and specific unemployment data are needed for a clearer picture.

> **National Multidimensional Poverty Index (MPI)**
> - It is a tool to measure and track the multiple deprivations faced by people in different aspects of their lives, such as health, education, nutrition, and living standards.
> - It was developed by the NITI Aayog, the policy think tank of the Government of India, in collaboration with various ministries and departments that are involved in addressing these deprivations.
> - The NITI Aayog also formed a MPI Coordination Committee (MPICC) to oversee the construction and implementation of the MPI, and to ensure its technical quality and relevance.
>   - The MPICC also includes experts from the Ministry of Statistics and Programme Implementation (MoSPI) and technical partners from the Oxford Poverty and Human Development Initiative (OPHI) and the United Nations Development Programme (UNDP).

## NITI Aayog has released 'National Multidimensional Poverty Index: A Progress of Review 2023'

- The report by the Niti Aayog indicates significant progress in India's efforts to reduce multidimensional poverty, reflecting improvements in health, education, and living standards.

### Importance of the MPI

- **Comprehensive Poverty Measurement:** The MPI provides a more comprehensive assessment of poverty than income alone, capturing various dimensions of deprivation. This allows policymakers to understand the specific needs and priorities of impoverished populations.
- **Monitoring Policy Impact:** The MPI aids in monitoring and evaluating the impact of policies and programs on different aspects of poverty and well-being. This fosters accountability, transparency, and informed decision-making.
- **Alignment with SDGs:** The MPI aligns with India's commitment to achieving inclusive and sustainable development, as outlined in the SDGs. It provides a valuable tool to track progress, identify gaps, and address challenges on the path to achieving these goals.

### Positive Trends and Achievements

### Reduction in Multidimensional Poverty Rate

- The report highlights a substantial **decline in India's multidimensional poverty rate, from 24.85% in 2015-16 to 14.96% in 2019-21**. This represents a significant positive shift, with approximately 135 million people lifting themselves out of multidimensional poverty during this period.

### Regional Progress

- States such as Uttar Pradesh, Bihar, Madhya Pradesh, Odisha, and Rajasthan have experienced the fastest reduction in multidimensional poverty. This underscores the effectiveness of poverty alleviation efforts in these regions.

### Rural and Urban Poverty Decline

- **Both rural and urban areas have witnessed a decline in poverty rates.** Rural poverty fell from 32.59% to 19.28%, while urban poverty dropped from 8.65% to 5.27%. This dual improvement indicates a comprehensive impact across different socio-economic settings.

## Progress Toward SDGs

- The report suggests that India is on track to achieve SDG target 1.2, which aims to reduce multidimensional poverty by at least half by 2030. The MPI value and intensity of poverty have both decreased, signalling positive momentum toward this goal.

## Improvement in Key Indicators

- The report identifies significant improvements in all parameters of the MPI, with notable progress in nutrition, child mortality, years of schooling, school attendance, cooking fuel, sanitation, and electricity. Government schemes and initiatives such as the National Nutrition Mission, Ayushman Bharat, and Swachh Bharat Mission are credited for these improvements.

## Policy Tool Importance

- The report emphasizes the National MPI as a crucial policy tool for identifying and addressing multiple dimensions of poverty and inequality. This recognition underscores the need for evidence-based policymaking to sustain and accelerate poverty reduction efforts.

## Concerns and Challenges

## Regional Disparities

- Despite overall progress, **the report underscores regional disparities,** with certain states (Bihar, Jharkhand, Uttar Pradesh, and Madhya Pradesh) having higher MPI values than others. Addressing these disparities will be crucial for achieving equitable development.

## Social Group and Gender Disparities

- Rural areas, Scheduled Tribes, and females exhibit higher MPI values, indicating disparities across social groups and genders. Tailoring interventions to address these specific challenges is essential for inclusive development.



**CHANGING FORTUNES**

Around 24.9% of Indians were assessed as multidimensionally poor in 2015-16, but that share came down to 15% in 2019-21.

A multidimensionally poor person is one who is at least 33.3% deprived overall (this is based on 12 indicators, all of which has a different weightage). Headcount ratio is the share of multidimensionally poor persons in population. Intensity refers to the average extent of deprivation among such persons (hence always >33.3%). The MPI value is headcount multiplied by intensity.

Source: Niti Aayog

## Recommendations

- **Reducing Disparities:** Addressing regional, social, and gender disparities in multidimensional poverty requires targeted interventions and policies.
- **Enhancing Data Quality:** Improving the quality and availability of data on multidimensional poverty at disaggregated levels is crucial for informed decision-making.
- **Strengthening Coordination:** Enhanced coordination among various ministries, departments, and stakeholders is vital to ensuring effective implementation of poverty reduction initiatives.
- **Community Engagement:** Increasing awareness and participation of civil society, media, academia, and other stakeholders is essential for advocacy and monitoring efforts.
- **Integrated Planning:** Integrating the MPI into planning, budgeting, and evaluation processes at all levels of government will enhance its effectiveness as a policymaking tool.
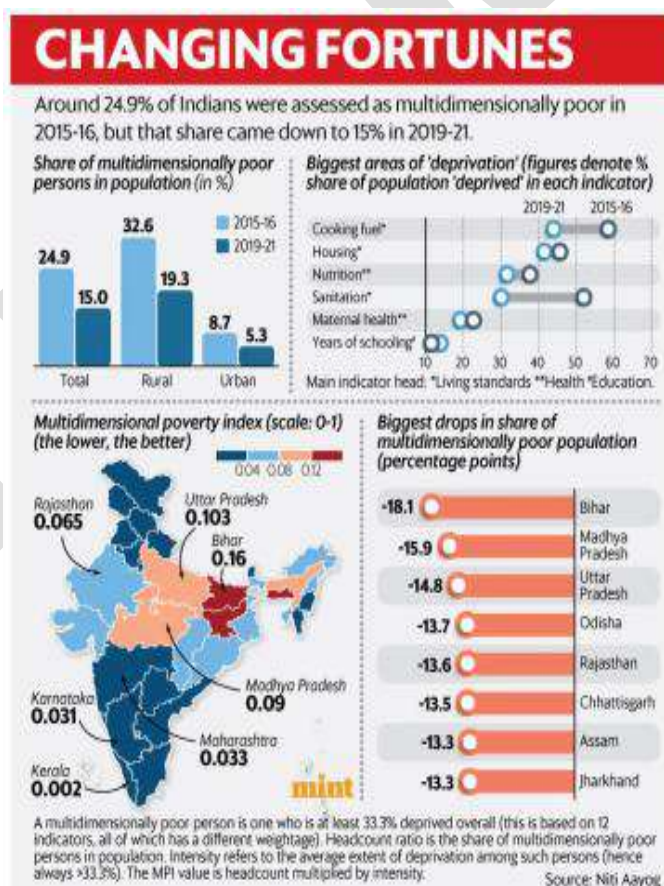
- **Leveraging Innovation:** Utilizing innovation, technology, partnerships, and best practices will accelerate progress in multidimensional poverty reduction.

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**Global Multidimensional Poverty Index (MPI)**

- It is a comprehensive measure of poverty that goes beyond income and captures the multiple dimensions of deprivation that people face.
- It assesses the extent and intensity of poverty at the individual and household levels, based on indicators of health, education, and living standards.
- It is a useful tool for policymakers and development practitioners to identify the most vulnerable groups and regions, and to design effective interventions to reduce poverty.
- It is jointly produced by the Oxford Poverty and Human Development Initiative (OPHI) and the United Nations Development Programme (UNDP) and is published annually in the Human Development Report.
- It contributes to the 2030 Agenda for Sustainable Development, which aims to end poverty in all its forms and dimensions and to ensure that no one is left behind. The 17 Sustainable Development Goals (SDGs) cover the economic, environmental, and social aspects of well-being, and are interlinked and indivisible.
- It aligns with several SDGs, especially Goal 1 on ending poverty, Goal 2 on ending hunger, Goal 3 on ensuring health, Goal 4 on ensuring education, Goal 5 on achieving gender equality, Goal 6 on ensuring water and sanitation, Goal 7 on ensuring energy, and Goal 10 on reducing inequalities.

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## Conclusion

- The report concludes that India's multidimensional poverty reduction is a remarkable achievement that reflects the concerted efforts of various government schemes and programs that target the poor and vulnerable sections of society. However, it also cautions that there is still a long way to go before India can eradicate poverty in all its forms and dimensions, and calls for continued policy action and social mobilization to ensure that no one is left behind.

## 3.4    DISTRESS IN TEXTILE INDUSTRY

## Context

- The Indian textile and clothing industry is facing a severe crisis due to a combination of factors impacting both domestic and international markets. This crisis has resulted in various repercussions across the textile value chain, affecting numerous industries and communities associated with it.

## Details

- The Indian textile and clothing industry, once a thriving contributor to economic growth and employment, now faces a complex crisis rooted in a combination of domestic and international challenges.
- This crisis has permeated the entire value chain, affecting manufacturers, exporters, farmers, weavers, garment workers, and communities dependent on the industry.

**Indian Textile Industry**

- The textile industry is one of the largest and most important sectors of the Indian economy, contributing to 2% of GDP, 7% of industrial output, 12% of exports and providing direct employment to over 45 million people.
- India is also a major player in the global textile market, being the second-largest exporter of textiles and clothing, the largest producer of cotton and jute, and the second-largest producer of silk and polyester.
- The textile industry in India is diverse and complex, comprising various segments such as cotton, man-made fibres, silk, wool, jute, handlooms, handicrafts and technical textiles. Each segment has its characteristics, challenges and opportunities.
- The industry is characterized by a large presence of small and medium enterprises, which account for 95% of the total units.
- The industry faces competition from countries like China, Bangladesh, Vietnam and Indonesia, which have lower costs of production and labour.
- The industry faces issues such as outdated technology, low productivity, environmental concerns, lack of skilled workers and infrastructure bottlenecks.

## Key Factors Contributing to the Crisis

- **Global Economic Slowdown:** The ongoing global economic slowdown, exacerbated by events like the Russia-Ukraine war and inflation, has led to a decrease in consumer demand for textiles and clothing in both domestic and international markets.
- **Rising Input Costs:** The cost of raw materials, such as cotton and man-made fibres, has surged, squeezing profit margins for manufacturers and making Indian products less competitive in the global market.
- **Free Trade Agreements and Competition:** Free trade agreements, especially with countries like Bangladesh, have given competitors a cost advantage due to lower labour costs and duty-free access to major markets like the EU, eroding India's competitive edge.
- **Technological Lag:** The Indian textile industry lags in terms of technology and automation, rendering it less efficient and unable to compete with technologically advanced global producers.
- **Infrastructure Bottlenecks:** Poor infrastructure, including unreliable power supply and inadequate transportation facilities, further hampers the industry's growth and efficiency.
- **Stringent Quality Control Measures**: Increasingly strict quality control measures imposed by major buyers have added to the compliance burden for Indian manufacturers, making it challenging to meet export requirements.

## Effect of the Crisis

- **The crisis has led to the closure of numerous textile mills and garment factories**, resulting in widespread job losses and economic hardship for workers and their families.
- **India's textile and clothing exports have witnessed a significant decline in recent months**, impacting the country's foreign exchange earnings and global market presence.
- **Falling cotton prices and reduced demand have severely impacted the livelihoods of cotton farmers**, pushing many into debt and financial distress.
- **The crisis has also affected allied industries** like spinning, dyeing, and finishing, leading to business closures and job losses throughout the supply chain.

**Government initiatives to support and promote the textile industry**

- The Production Linked Incentive (PLI) Scheme provides financial incentives to manufacturers of man-made fibres, fabrics and technical textiles to boost domestic production and exports.
- The Technology Upgradation Fund Scheme (TUFS) provides subsidies for the modernization and upgradation of technology in the textile sector.
- The Integrated Textile Parks (ITP) Scheme assists in setting up textile parks with common infrastructure facilities.
- The Scheme for Integrated Textile Processing Development (SITP) provides financial support for setting up effluent treatment plants and zero liquid discharge systems in textile clusters.
- The National Handloom Development Programme (NHDP) aims to enhance the competitiveness and productivity of handloom weavers and artisans.
- The National Handicrafts Development Programme (NHDP) assists in skill development, design innovation, marketing and promotion of handicrafts.
- The Silk Samagra Scheme focuses on improving the quality and productivity of silk production in India.
- The Jute ICARE Scheme aims to improve the quality and yield of raw jute through better agronomic practices.

## Way Forward

- **The government needs to implement supportive policies,** including providing financial assistance, simplifying labour laws, and promoting technological upgrades in the textile industry.
- **The industry should move beyond basic textiles** and concentrate on innovation, design, and value addition to cater to niche markets and differentiate itself from competitors.
- **Upskilling and training workers** in new technologies and design skills are crucial to improve efficiency and productivity in the sector.
- **Investing in infrastructure development**, including improving power supply, transportation, and logistics, will reduce costs and enhance the industry's competitiveness.
- **Collaboration between industry players, government agencies, and research institutions** can foster innovation and promote sustainable growth in the textile and clothing sector.

## Conclusion

- The crisis facing the Indian textile and clothing industry is multi-faceted and requires a comprehensive, multi-pronged approach to revival. By addressing underlying challenges, embracing innovation, and implementing supportive policies, India can revitalize its textile sector and regain its position as a global leader in the industry.

## 3.5    PRIMARY AGRICULTURAL CREDIT SOCIETIES

## Context

- The Ministry of Cooperation has formulated Model Byelaws to improve the viability and diversify the business activities of Primary Agricultural Credit Societies (PACS), transforming them into vibrant economic entities in rural areas.

## Key Elements of the Model Byelaws

- **The objective of the Byelaws:** To enhance the viability and expand the operational scope of PACS, aligning them more closely with the evolving needs of rural economies.

- **Stakeholder Engagement:** Extensive consultation with various stakeholders resulted in over 1,500 suggestions being integrated into the draft bylaws, ensuring a collaborative and comprehensive approach.
- **Adoption and Reach:** Significantly, 31 states/UTs have embraced and adopted these Model Byelaws, showcasing widespread acceptance and readiness for implementation.
- **Diversification of Activities:** PACS are now empowered to engage in more than 25 diversified business activities, including dairy, fishery, floriculture, agricultural procurement, and essential goods distribution.
- **Membership Inclusivity:** Provisions have been made to foster a more inclusive membership, accommodating women and marginalized communities, thereby aiming for a more representative and diverse participation.
- **Benefits for PACS and Farmers:** These bylaws promise enhanced operational efficiency, transparency, and the provision of multi-service functionalities for PACS. For farmers, they offer a one-stop gateway to credit, various services, social security schemes, and e-services, while also ensuring additional income streams through the diversification of activities.

## Primary Agricultural Credit Societies (PACS)

- They are the **smallest and most fundamental units of the cooperative credit system in India**, serving as the vital link between farmers and financial resources.
- They are registered under the Cooperative Societies Act of the respective state.
- They **operate under the Co-operative Societies Act and the RBI's supervision. The Banking Regulation Act 1949 and the Banking Laws (Co-operative Societies) Act 1965 also apply to them.**



- Membership is open to individuals residing in the village or area served by the society, typically farmers, agricultural labourers, and artisans.
- **The society is governed by a managing committee elected by its members**. This committee oversees the operations, approves loan applications, and manages the finances.
- They have limited paid staff and rely heavily on volunteers from the community.
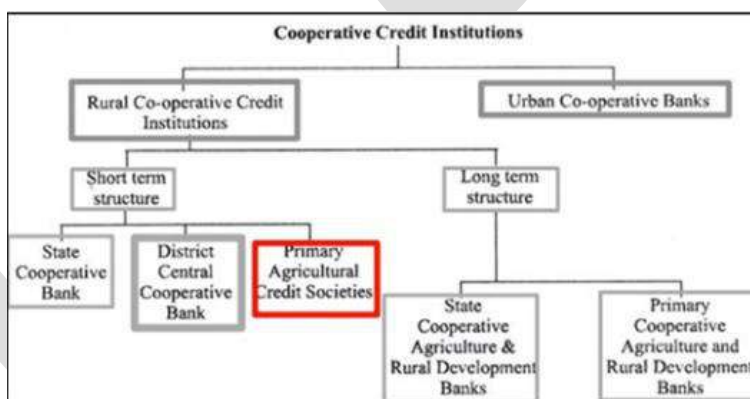
### Key Functions

- **They offer loans to their members for various agricultural needs,** including purchasing seeds, fertilizers, implements, and livestock. This helps farmers overcome financial constraints and invest in their farms.
- **They encourage members to save money, providing a secure and convenient option for managing their finances**. These savings are then used to fund loans for other members.
- **They act as a channel for distributing essential agricultural inputs** like seeds, fertilizers, and pesticides at affordable prices to their members. They may also provide consumer goods and other essential items.
- **They help farmers to connect with markets and buyers**, potentially fetching better prices for their produce. They may also provide storage facilities to reduce post-harvest losses.

### Significance

- **Increased access to credit:** PACS provide a readily accessible source of credit for small and marginal farmers who often struggle to obtain loans from formal banks.
- **Improved farm productivity:** Access to credit allows farmers to invest in better inputs and technology, leading to increased yields and income.
- **Financial empowerment:** PACS promote financial inclusion and self-reliance among rural communities.

- **Market access and bargaining power:** By facilitating market linkages and storage, PACS can empower farmers to negotiate better prices for their produce.

## Challenges

- **Financial instability:** PACS suffer from low capital base, high non-performing assets, inadequate provisioning, and dependence on higher-level cooperatives for funds. This affects their ability to lend to farmers at reasonable rates and terms.
- **Operational inefficiencies:** PACS have outdated systems and processes, a lack of automation and digitization, and poor management practices. This leads to delays, errors, and leakages in service delivery and monitoring.
- **Lack of skilled manpower:** PACS have a shortage of qualified and trained staff, especially at the managerial and technical levels. This hampers their capacity to adopt best practices, innovate, and diversify their products and services.

## Reforms

- **Governance improvement:** PACS are being encouraged to adopt democratic and transparent governance structures, with active participation of members, regular elections, audits, and disclosures. This will enhance accountability, trust, and ownership among the stakeholders.
- **Financial viability enhancement:** PACS are being supported to increase their funds, reduce bad loans, diversify their income sources, and leverage external funds. This will improve their financial health and resilience.
- **Technology adoption:** PACS are being facilitated to adopt digital platforms, such as core banking solutions, mobile apps, biometric authentication, etc., for efficient and secure operations. This will reduce costs, improve service quality, and increase outreach.

## Conclusion

- The Model Byelaws for PACS represents a positive step towards rural development and economic empowerment. While challenges exist, addressing them through continued efforts, awareness programs, and capacity building can ensure the sustained success of this initiative. The potential benefits for both PACS and farmers make it a crucial aspect of fostering economic growth in rural India.

## 3.6 MULTIDIMENSIONAL POVERTY INDEX

## Context

- The claim that poverty was nearly halved between 2015 and 2019, as stated by the Multidimensional Poverty Index (MPI), does not truly reflect the realities of the poor and marginalized in India.

## Criticisms of the MPI in India

- **Data quality concerns:** The reliance on the National Family Health Survey (NFHS) 4 and 5, which faced controversies and accusations of manipulated data, raises questions about the MPI's foundation. The suspension of the NFHS 5 lead demographer further casts doubt on the data's reliability.
- **Unrealistic poverty reduction claims:** The near-halving of India's MPI value between 2015-16 and 2019-21 seems implausible, especially considering the economic slowdown and devastating impact of the COVID-19 pandemic.
- **Unbalanced weighing:** Using uniform weights for health, education, and living standards in the MPI disregards the varying degrees of deprivation within each dimension. For example, a small decrease in education might have a larger impact on poverty than a similar decrease in the standard of living.

- **Discrepancies with alternative analyses:** Alternative analysis using covariates like state income and health expenditure offers a contrasting picture, suggesting a much smaller reduction in poverty compared to the official MPI estimate. This raises concerns about the accuracy and robustness of the MPI methodology.
- **Inconsistent state-level trends:** The contradictory trends observed across states, with some like Uttar Pradesh showing a rise in poverty, further highlight potential flaws in the MPI's ability to capture the nuanced realities of different regions.

## Potential Implications

- **Overstating government success**: If the MPI exaggerates poverty reduction, it could create a false narrative of success and mask the true extent of poverty, hindering effective interventions and resource allocation.
- **Misallocation of resources:** Basing decisions on inaccurate poverty data could lead to misallocation of resources, potentially depriving the most vulnerable populations and rendering interventions ineffective.
- **Erosion of trust:** Lack of transparency and potential data manipulation in the MPI could erode public trust in government efforts and initiatives aimed at poverty reduction.

## Alternative Approaches and Recommendations

- **Diverse data sources:** Utilizing a combination of household surveys, administrative records, community-based monitoring, and qualitative data can provide a more accurate and holistic picture of poverty than relying solely on NFHS data.
- **Nuanced multidimensional approach:** Moving beyond a single index like MPI and adopting a more nuanced framework that considers various dimensions of poverty, assigns appropriate weights based on context, and acknowledges the limitations of each dimension is crucial.
- **Transparency and independent validation:** Openness about data selection, methodology, and limitations, along with independent validation by non-governmental bodies, can build trust and ensure the credibility of poverty estimates.
- **Contextual understanding:** Recognizing the specific challenges and vulnerabilities of different

**Key Highlights of the Multidimensional Poverty Index (MPI) 2023**

- The Global Multidimensional Poverty Index (MPI) 2023 has been released by the United Nations Development Programme (UNDP) and the Oxford Poverty and Human Development Initiative (OPHI).
- Measures acute multidimensional poverty across 100+ developing countries.
- Monitors deprivations in 10 indicators across health, education, and standard of living.

Global:
- 1.1 billion people (18%) live in acute multidimensional poverty.
- Children under 18 account for half of MPI-poor people (566 million).
- Sub-Saharan Africa and South Asia have 534 and 389 million poor respectively.

India
- More than 230 million people are multidimensionally poor.
- India halved its MPI value within 15 years, with 415 million escaping poverty (2005-2021).
- Poverty incidence declined significantly, from 55.1% to 16.4% (2005-2021).
- Progress in all deprivation indicators: health, education, and standard of living.
- Equal decline across regions and socio-economic groups.
- Fastest progress among poorest states, groups, and children.

Additional Points:
- The report highlights the importance of going beyond income-based measures to understand poverty comprehensively.
- It emphasizes the need for targeted interventions based on specific deprivations and local contexts.
- India's progress is commendable, but continued efforts are needed to address remaining challenges and ensure inclusive poverty reduction.

regions and communities is essential for designing effective and targeted interventions.

## Conclusion

- The excerpt sheds light on the complexities and potential flaws of using the MPI in India. It emphasizes the importance of a multidimensional approach, data transparency, and independent validation for accurate poverty assessment and effective interventions. Moving beyond a singular index and embracing a nuanced understanding of poverty's multifaceted nature are crucial steps towards tackling this persistent global challenge.

## 3.7    NON-CONVERTIBLE REDEEMABLE PREFERENCE SHARES

### Context

- The Securities and Exchange Board of India (SEBI) has proposed changes to the issuance of non-convertible debentures (NCDs) and non-convertible redeemable preference shares (NCRPS) to enhance the participation of non-institutional investors in the corporate bond market and manage associated risks.

### Proposed Changes by SEBI

#### Reduced Face Value

- SEBI suggests allowing companies to issue NCDs and NCRPS with a face value of Rs. 10,000, substantially lower than the current Rs. 1 lakh.
- The rationale is to make these securities more accessible to non-institutional investors by reducing the entry barrier imposed by the high face value.

#### Risk Mitigation Measures

- SEBI emphasizes the need for these NCDs and NCRPS to be straightforward, termed "plain vanilla" instruments with a simple structure. Complex features like credit enhancements or structured obligations are discouraged.
- The issuer must appoint a merchant banker to conduct due diligence for issuance, ensuring adequate disclosures in the private placement memorandum.

**Non-convertible redeemable preference shares**

- They are a type of preference shares that cannot be converted into ordinary shares of the company.
- They have a fixed dividend rate and a fixed maturity date, after which they are redeemed by the company at their face value.
- They have priority over ordinary shares in terms of dividend payments and liquidation proceeds, but they do not have voting rights or any say in the management of the company.
- They are suitable for investors who seek a steady income stream and a lower risk profile than ordinary shares.

#### Online Bond Platforms (OBPs)

- The proposal coincides with the **introduction of a regulatory framework for online bond platforms**. SEBI notes a significant presence of non-institutional investors on these platforms.
- The reduction in face value is expected to further increase participation, especially among non-institutional investors.

#### Investor Participation Trends

- SEBI's paper highlights an increase in non-institutional investor participation from less than 1% to 4% of the total amount raised during a specific period, attributed to the earlier reduction in face value and the integration of online bond platforms.

#### QR Code for Listed NCDs

- Issuers with listed outstanding NCDs are proposed to include a QR code in the offer document, linking to the audited financials for the last three financial years and stub period financials on the stock exchange's website.

**Securities and Exchange Board of India (SEBI)**

- The SEBI is the regulator of the securities market in India.
- It was established in 1988 and given statutory powers in 1992 through the SEBI Act, 1992.
- Its main objectives are to protect the interests of investors in securities, to promote the development of the securities market, and to regulate the securities market in accordance with the provisions of the SEBI Act.
- The SEBI performs various functions such as registering and regulating intermediaries, issuing guidelines for issuers and investors, conducting inspections and investigations, imposing penalties and sanctions, and adjudicating disputes.

## Conclusion

- The proposed changes seek to democratize the corporate bond market, particularly for non-institutional investors, while ensuring adequate risk management measures. The reduction in face value and integration of online platforms are central strategies to achieve these objectives. SEBI aims to foster inclusivity and transparency within the market by simplifying investment instruments and increasing accessibility for retail investors.

## 3.8    EXCHANGE-TRADED FUNDS

### Context

- In the Lok Sabha, the Minister of State in the Labour Ministry stated that the Employees' Provident Fund Organisation (EPFO) has invested more than Rs 2.5 trillion in exchange-traded funds (ETFs) since 2016.

### Exchange-traded funds (ETFs)

- Exchange-traded funds (ETFs) are **a type of investment that tracks the performance of a basket of securities, such as stocks, bonds, commodities, or currencies.**
- **ETFs can be traded on stock exchanges like regular stocks**, but they offer more diversification and lower costs than individual securities.
- ETFs are popular among investors who want to gain exposure to a specific market, sector, or theme, without having to buy and manage multiple securities.

#### Advantages

- **Diversification:** ETFs allow investors to gain exposure to a wide range of markets, sectors, regions, or themes with a single purchase, reducing the risk of investing in a single company or asset class.
- **Low Cost:** ETFs typically have lower fees and expenses than mutual funds or other actively managed funds, leading to cost efficiency.
- **Tax Efficiency:** ETFs are generally more tax-efficient than mutual funds, as they do not distribute capital gains to shareholders. Taxes are paid when investors sell their ETF shares, giving them more control over their tax situation.

**Employees' Provident Fund Organisation (EPFO)**

- **EPFO is a statutory body established to administer the Employees' Provident Funds and Miscellaneous Provisions Act 1952.**
- It manages provident fund accounts for eligible employees and employers.
- **EPFO collects contributions from both employees and employers**, investing them in various government securities.
- It disburses monthly pensions to retired employees and their families, including family pensions in case of the employee's death during the service period.
- **EPFO frames rules and regulations for provident funds** monitors employer activities and ensures compliance with the Act.
- Administers social security schemes like the Employees' Deposit Linked Insurance Scheme (EDLI) and the Atal Pension Yojana.

- **Transparency:** ETFs disclose holdings and performance daily, providing investors with clear insights into their investments. Clear and consistent rules reduce the risk of manager bias or style drift.
- **Flexibility:** ETFs can be used for various investment strategies and objectives, such as income generation, hedging, asset allocation, or speculation. They can also be traded using various methods, including limit orders, stop orders, or margin trading.

## Disadvantages

- **Market Risk:** ETFs are subject to market fluctuations and volatility, and their value will decline if the market declines.
- **Tracking Error:** ETFs may not perfectly replicate the performance of their underlying index due to fees, expenses, liquidity issues, or rebalancing. This can lead to underperformance or outperformance compared to their benchmark.
- **Liquidity Risk:** ETFs may experience low trading volume or wide bid-ask spreads, affecting their liquidity and price. This can make it challenging for investors to buy or sell ETF shares at a fair price.
- **Counterparty Risk:** Some ETFs use derivatives, exposing them to the risk that the counterparty to the derivative contract may default or fail to honour its obligations.
- **Regulatory Risk:** ETFs are subject to changing laws and regulations that may affect their structure, operation, or taxation, creating uncertainty and complexity for investors and issuers.

> **EPFO's ETF Investments**
> - EPFO has invested over Rs 2.5 trillion in ETFs over the past seven years.
> - Initially, 5% of the EPFO's corpus was invested in ETFs, later raised to 15%, potentially due to perceived benefits and the potential for higher returns.
> - The EPFO's overall investment corpus exhibited a healthy growth rate of 16.7% in the fiscal year 2022-23, indicating successful management and possibly favourable market conditions.
> - By opting for ETFs instead of individual stocks, EPFO potentially mitigates risks associated with stock-picking while benefiting from broader market movements.

## Conclusion

- EPFO's strategic use of ETFs aligns with its objectives of achieving diversification, cost efficiency, and risk mitigation while managing the provident fund accounts of employees and employers. The advantages and disadvantages of ETFs outlined provide a comprehensive understanding of the considerations associated with this investment approach.

## 3.9 CRYPTO ASSET INTERMEDIARIES

### Context

- The Financial Stability Board (FSB) report sheds light on several critical aspects concerning multi-function crypto-asset intermediaries (MCIs) and their potential impact on the global financial landscape.

### Key Highlights of the report

#### Nature of Crypto-Asset Intermediaries (CAIs) and MCIs

- **CAIs, including MCIs, facilitate the exchange, trading, and storage of crypto-assets,** catering to both retail and institutional investors.
- **MCIs are entities or groups offering a diverse range of crypto-based services,** often focused on running trading platforms. Examples include Binance, Bitfinex, and Coinbase.

#### Comparison: Traditional Finance v/s MCI

- **Combination of Functions:** MCIs differ from traditional financial institutions by integrating various services under one entity, potentially leading to conflicts of interest and impacting market integrity, investor protection, and financial stability.

- **Revenue Generation:** MCIs primarily earn revenue through transaction fees related to trading activities, especially those involving self-issued crypto assets. Their goal is to provide comprehensive crypto-based services, such as prepaid debit cards and lending.

## Risk Management and Transparency Challenges

- **Lack of Transparency:** Most MCIs maintain limited publicly available corporate information, often being privately held. This lack of transparency could be intentional, possibly to evade regulatory oversight by obscuring vulnerabilities and economic models.

- **Poor Risk Management:** The report highlights inadequate risk management practices among MCIs, potentially allowing insiders to engage in misconduct. Insufficient transparency might conceal governance and profitability risks until adverse events occur.

## Spillover Effects and Global Stability

- **Spillover Risks:** While the immediate threat to global financial stability from MCI failures is currently deemed "limited," recent instances, like the FTX

- collapse impacting banks like Silvergate, reveal vulnerabilities in the system.

- **Depository Risks:** The failure or closure of crypto-asset-friendly banks shows concentrated deposit exposures to firms relying on crypto assets, affecting confidence in these assets.

## FSB's Role and Recommendations

- **Financial Stability Board (FSB) established by the G20**, the FSB aims to promote financial stability by identifying vulnerabilities, facilitating regulatory cooperation, setting global financial standards like Basel III, and conducting research on financial stability.

- The FSB stresses the necessity for regulatory attention, advocating transparency, effective risk management, and cross-border cooperation among authorities to mitigate risks associated with MCIs.

## Conclusion

- The report underscores the urgency for comprehensive regulatory measures, increased transparency, and collaborative efforts among global financial authorities to address the potential risks posed by MCIs to the stability of the global financial system.

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## 3.10    WHO REPORT ON ROAD SAFETY

## Context

- The World Health Organization (WHO) published its Global Status Report on Road Safety 2023, indicating a global reduction of 5% in road traffic deaths annually worldwide from 2010 to 2021, with 108 UN member nations reporting a decline. However, India witnessed a 15% increase in road traffic fatalities during the same period.

## Details

- The Global Status Report on Road Safety 2023 highlights the ongoing challenge of road safety, particularly in low- and middle-income countries, and underscores the need for continued efforts to reduce road traffic deaths globally.

## Key findings from the report

### Global Trends

- Road traffic deaths decreased by 5% globally, amounting to 1.19 million fatalities annually between 2010 and 2021.

- The road fatality rate declined from 18 per 100,000 people in 2010 to 15 per 100,000 in 2021, representing a 16% decline in the road traffic death rate since 2010.

### India's Situation

- In India, the total number of road traffic fatalities increased from 1.34 lakh in 2010 to 1.54 lakh in 2021, marking a 15% rise.

- India stood out among countries with an upward trend in road traffic deaths.

## Global Motor Vehicle Fleet

- The global motor vehicle fleet has grown by 160% since 2010.
- Annual fatality rates per 100,000 vehicles declined from 79 deaths to 47 deaths, representing a 41% reduction.

## Regional Distribution

- 28% of global road traffic deaths occurred in the WHO's South-East Asia Region.
- Other regions contributed as follows: Western Pacific Region (25%), African Region (19%), Region of the Americas (12%), Eastern Mediterranean Region (11%), and European Region (5%).

## Income Disparities

- Nine in 10 road traffic deaths occurred in low- and middle-income countries.
- Fatality rates were three times higher in low-income countries compared to high-income countries, despite low-income countries having only 1% of the world's motor vehicles.

## User Categories

- Four-wheel vehicle occupants represented 30% of global fatalities.
- Other categories included pedestrians (23%), powered two- and three-wheeler users (21%), cyclists (6%), and users of micro-mobility devices (3%).

### World Health Organization (WHO)

The World Health Organization (WHO) is the United Nations' specialized agency for international public health. Established in 1948, its mission is to promote health, keep the world safe.

The WHO provides leadership on global health matters, shaping the health research agenda, setting norms and standards, articulating evidence-based policy options, providing technical support to countries and monitoring and assessing health trends.

There are 194 Member States, 150 country offices, six regional offices. Its headquarters are situated in Geneva, Switzerland.

**Structure**
1. **World Health Assembly (WHA)** is WHO's decision-making body attended by delegations from all of WHO's member states, it is held yearly at the headquarters of WHO, i.e., Geneva, Switzerland.
2. **Executive Board:** 34 health experts elected by the WHA, providing advice and implementing decisions.
3. **Secretariat:** Headed by the Director-General, responsible for day-to-day operations and technical programs.

**Reports published by WHO**
1. **World Health Report:** It provides an annual assessment of a global health topic. The latest report, released in 2023, focuses on Health and Climate Change.
2. **World Health Statistics:** This annual report compiles statistics for key health indicators on an annual basis. The 2023 edition reviews more than 50 health-related indicators from the Sustainable Development Goals (SDGs) and WHO's Thirteenth General Programme of Work.
3. **Global Health Observatory (GHO) data:** The GHO provides access to a wealth of health data, including country profiles, disease trends, and risk factor estimates.
4. **Global Status Report on Noncommunicable Diseases:** This report provides an overview of the global burden of NCDs and progress towards NCD targets.
5. **World Cancer Report:** This report provides an overview of the global cancer burden and trends.
6. **World Report on Violence and Health:** This report provides an overview of the global burden of violence and its health impacts.
7. **World Report on Road Safety:** This report provides an overview of the global road safety crisis and progress towards road safety targets.
8. **World Report on Ageing and Health:** This report provides an overview of the global ageing population and the challenges and opportunities it presents.

## Road Safety in India

- India is one of the fastest-growing economies in the world, with a population of over 1.3 billion people and rapidly expanding urbanization and motorization. However, this growth also comes with a high cost of road traffic injuries and fatalities, which are among the leading causes of death and disability in the country.
- **According to the World Health Organization (WHO), India accounted for about 11% of global road deaths in 2019**, with an estimated 151,113 people killed and many more injured on its roads. This is equivalent to one road death every 3.5 minutes or 414 deaths per day.
- **The impact of road crashes is not only a human tragedy but also a huge economic and social burden for the nation**. The WHO estimates that **road traffic injuries cost India about 3% of its gross domestic product (GDP) every year**. Moreover, road crashes affect the most productive age group of 15-49 years, resulting in loss of income, productivity and human capital.
- **Road safety is also closely linked to other development goals**, such as poverty reduction, health, education, gender equality and environmental sustainability.

## Steps taken to improve Road Safety

Launching the National Road Safety Policy, 2010, which outlined the vision, mission, objectives and strategies for improving road safety in India.

Developing the Road Accident Database Management System (RADMS), which aims to collect, analyze and disseminate reliable and standardized data on road crashes across the country.

Enacting the Motor Vehicles (Amendment) Act, 2019, which introduced stricter penalties for traffic violations, enhanced provisions for licensing, registration, insurance and vehicle fitness, and established a National Road Safety Board to advise on policy matters.

Participating in the United Nations Decade of Action for Road Safety 2011-2020, which provided a global framework and platform for enhancing road safety cooperation and coordination among various stakeholders.

Implementing the National Road Safety Action Plan, 2015-2020, which set specific targets and indicators for reducing road fatalities and injuries by 50% by 2020.

Joining the Stockholm Declaration on Road Safety, 2020, which reaffirmed the commitment to achieve the Sustainable Development Goal (SDG) target of halving the number of global road deaths and injuries by 2030.

## Challenges and gaps in achieving its road safety goals

- Lack of adequate infrastructure and engineering solutions for safe roads, vehicles and mobility systems.
- Low level of awareness and compliance with traffic rules and regulations among road users.
- Inadequate enforcement and monitoring mechanisms for ensuring road safety compliance and accountability.
- Insufficient emergency care and trauma management services for road crash victims.
- Limited research and innovation capacity for developing evidence-based road safety interventions and best practices.
- Weak coordination and collaboration among various ministries, departments, agencies and stakeholders involved in road safety.

## Ways forward

- **Strengthening the institutional framework and governance structure** for road safety at the national, state and local levels.
- Investing in safe infrastructure design and maintenance that incorporates the needs of all road users, especially vulnerable groups such as pedestrians, cyclists and motorcyclists.
- Promoting safer vehicle standards and technologies that enhance crash avoidance and protection.

- **Enhancing road user behaviour change through effective awareness campaigns**, training programs and incentives.
- Improving enforcement capacity and efficiency through modernization of traffic management systems, use of technology and data analytics, and strengthening of legal provisions.
- **Expanding access to quality emergency care and rehabilitation services** for road crash victims through strengthening of pre-hospital care systems, trauma networks and referral mechanisms.
- Fostering research and innovation culture for generating evidence-based solutions and best practices for road safety.
- Building partnerships and alliances with various stakeholders from public, private and civil society sectors for mobilizing resources, expertise and advocacy for road safety.

## Conclusion

- Road safety is not only a matter of public health or transport policy but also a matter of human rights and social justice. Every life lost or injured on the road is preventable. Every life saved or protected on the road is valuable. It is time to act together to make road safety a priority for India.

## 3.11 ECONOMIC PACT BETWEEN INDIA AND EFTA STATES

### Context

- The negotiations between India and the European Free Trade Association (EFTA) for a Trade and Economic Partnership Agreement (TEPA) have faced hurdles due to concerns raised by EFTA members, particularly Switzerland, on specific issues.

### Details

#### Concerns Raised by Switzerland and EFTA

- Switzerland, along with other EFTA members (Iceland, Liechtenstein, Norway), has raised concerns regarding the mobility of Indian professionals and intellectual property rights (IPR).
- IPR is a critical component for many exports from EFTA member states, particularly Switzerland, which is a key reason for their concerns.

#### Revised Indian Proposal and Complications

- The negotiations faced complications due to a revised Indian proposal regarding market access for specific goods, details of which were not disclosed.
- Despite significant progress in recent months, these developments have complicated the negotiations.

#### Ongoing Efforts to Conclude TEPA

- Both India and EFTA remain engaged in resolving these issues to conclude the TEPA.
- While there is no specific deadline, both sides aim to sign the agreement by early next year.

#### Recent Engagements and Efforts

- Norway's trade minister and Switzerland's state secretariat for economic affairs visited New Delhi in December to push for resolving outstanding issues.
- Discussions took place between the visiting officials and Indian commerce and finance ministers to gauge progress and find common ground.

#### Challenges and Equitable Approach

- Negotiators acknowledge differences in the developmental levels and challenges faced by citizens in developed EFTA countries compared to those in India.
- The focus remains on achieving a mutually beneficial agreement by addressing these differences.

#### Trade Imbalance and Agreement Coverage

- There's a trade imbalance between India and EFTA states, with trade skewed in favour of EFTA.
- Negotiations cover various aspects, including trade in goods and services, rules of origin, IPR, trade and sustainable development, among others, aiming for a balanced deal.
- The negotiations continue to address concerns and bridge differences between India and the EFTA nations, aiming for an agreement that benefits both sides while considering the varying economic and developmental contexts of the involved countries.

### European Free Trade Association (EFTA)

- It is a regional trade organization that consists **of four member states: Iceland, Liechtenstein, Norway and Switzerland.**
- It was established in 1960 as an alternative to the European Economic Community (EEC), which later became the European Union (EU).
- It aims to promote free trade and economic integration among its members, as well as with other countries around the world.

#### Working

- One of the main instruments of the EFTA's external trade policy is the negotiation of free trade agreements (FTAs) with third countries.
- **The EFTA has signed FTAs with more than 40 countries and territories**, covering various sectors such as goods, services, investment, intellectual property rights, public procurement and dispute settlement.
- **The EFTA's FTAs are compatible with the rules and principles of the World Trade Organization (WTO)** and complement the bilateral agreements that the EFTA states have with the EU.

## Some of the main areas of interest for EFTA negotiations

### Industrial goods

- EFTA seeks to eliminate tariffs and other barriers to trade for industrial goods, including fish and other marine products, as well as processed agricultural products.
- **EFTA also aims to ensure effective rules of origin, customs procedures, technical regulations**, standards and conformity assessment procedures.



Norway
Iceland
Liechtenstein
Switzerland

EFTA

European Free Trade Association

### Services

- **EFTA seeks to improve market access and national treatment for service providers in various sectors**, such as financial services, telecommunications, transport, tourism, professional services and environmental services.
- EFTA also aims to ensure a high level of protection for intellectual property rights, including geographical indications.

### Investments

- EFTA seeks to establish a comprehensive framework for the promotion and protection of investments, including provisions on national treatment, most-favoured-nation treatment, fair and equitable treatment, expropriation and compensation, transfers, dispute settlement and corporate social responsibility.

### Government procurement

- EFTA seeks to ensure transparency, non-discrimination and fair competition in government procurement markets, as well as mutual access to procurement opportunities at central and sub-central levels of government.

## India and EFTA relations

### About

- India and EFTA are important economic partners with complementary strengths and interests.
- **India is one of the fastest-growing economies in the world with a large domestic market**, a young and skilled workforce, and a diversified industrial base.
- EFTA states are among the most competitive and innovative economies in the world with a high level of human development, technological expertise, and environmental standards.
  - They are also major investors in India with over $35 billion of foreign direct investment (FDI) as of 2020.
- The EFTA and India launched FTA negotiations to create a comprehensive and ambitious agreement that would enhance trade and investment flows between the two sides.

### Trade and Economic Partnership Agreement (TEPA)

- A TEPA between India and EFTA would create new opportunities for trade and investment by **eliminating or reducing tariffs and non-tariff barriers on a wide range of products and services**.
- It would also enhance cooperation in areas such as intellectual property rights, government procurement, competition policy, dispute settlement, and sustainable development.
- EFTA seeks to enhance cooperation with India in areas such as competition policy, trade facilitation, trade and sustainable development, trade and gender equality, trade defence instruments, dispute settlement and institutional arrangements.

### Expected Outcomes

- **According to a study by the Indian Council for Research on International Economic Relations (ICRIER), a TEPA could increase**

**India's exports to EFTA by 58% and EFTA's exports to India by 10%.** It could also generate additional income of $2 billion for India and $1.6 billion for EFTA.

- TEPA between India and EFTA would support their respective efforts to diversify their trade partners and reduce their dependence on traditional markets such as the European Union (EU) and China.
  - o It would also enable them to leverage their respective strengths in sectors such as pharmaceuticals, biotechnology, machinery manufacturing, information technology, renewable energy, and tourism.
- **India could benefit from EFTA's cutting-edge technologies in solar, wind, hydro, and geothermal power** to achieve its green growth aspirations.
- EFTA could benefit from India's highly skilled workforce in the services sector and its growing consumer demand.

## Challenges

- Some challenges **need to be addressed before a TEPA can be concluded.** Resolving the

differences on issues such as intellectual property rights protection, data security norms, agricultural subsidies, sanitary and phytosanitary measures, rules of origin, and labour standards.

- These issues reflect the different levels of development, economic structure, regulatory framework, and social preferences of the parties involved. Therefore, a successful TEPA would require a flexible and pragmatic approach that balances the interests of both sides while ensuring high standards of quality and sustainability.

## Conclusion

- A TEPA between India and EFTA would be a win-win proposition for both sides as it would enhance their bilateral trade and economic partnership while contributing to a more inclusive global trading system. It would also strengthen their strategic ties and mutual understanding of changing world order. Therefore, both sides should make sincere efforts to resume their negotiations and overcome their differences at the earliest.

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## 3.12  MARGINAL COST OF FUNDS-BASED LENDING RATE

## Context

- The State Bank of India (SBI), the largest state-owned bank in the country, has announced an increase in its marginal cost of funds-based lending rate (MCLR) by up to 10 basis points.

## What is MCLR?

- **MCLR stands for Marginal Cost of Funds Lending Rate, which is the minimum lending rate below which a bank is not allowed to lend,** except in some cases allowed by the Reserve Bank of India (RBI).
- MCLR replaced the earlier base rate system in April 2016 to determine the lending rates for commercial banks. It is an internal benchmark or reference rate for banks to determine the interest they can charge on loans.
- It is based on the marginal cost of funds, i.e., the additional or incremental cost of arranging one more rupee for a prospective borrower.

## Why was MCLR introduced?

- **MCLR was introduced by the RBI to improve the transmission of policy rates** into the lending rates of banks.
- Under the MCLR system, banks have to adjust their interest rates as soon as the policy rates change, as it affects their marginal cost of funds.

- **It aims to bring more transparency and uniformity** in the interest rate structure of banks and ensure fair treatment of borrowers and lenders.

## How is MCLR calculated?

- **Marginal cost of funds:** This is the weighted average of the cost of borrowings and return on net worth for banks. It comprises the marginal cost of borrowings, i.e., the interest rate at which banks raise deposits or borrow from other sources, and negative carry on account of cash reserve ratio (CRR), i.e., the cost of keeping a portion of deposits with RBI without any interest.
- **Tenor premium:** This is the charge for the risk associated with lending for a longer duration, as longer loans are more prone to interest rate fluctuations and credit risk.
- **Operating costs:** These are the expenses incurred by banks to provide loans, such as administrative costs, employee costs, rent, electricity, etc.
- **Negative carry-on mandatory statutory liquidity ratio (SLR):** This is the cost of keeping a certain percentage of deposits in government securities as mandated by RBI, which earns lower returns than other investments.

- Banks have to calculate and publish their MCLR for different loan tenors, such as overnight, one month, three months, six months, one year, etc., every month or at a pre-announced cycle. The actual lending rates are determined by adding a spread or margin to the MCLR depending on the risk profile and creditworthiness of the borrower.

## What are the features and benefits of MCLR?

**Features and Benefits of MCLR**

It is more sensitive and responsive to changes in policy rates and market interest rates, as it reflects the current cost of funds for banks rather than historical costs.

It promotes fair and transparent pricing of loans by banks based on their actual cost of funds and risk perception.

It benefits borrowers who opt for floating rate loans, as they can enjoy lower interest rates when policy rates decline.

It ensures better transmission of monetary policy actions by the RBI to influence economic activity and inflation.

It enhances competition among banks and reduces discrimination among borrowers, as banks have to offer loans at similar rates for similar risk profiles.

It also benefits depositors, as banks have to offer higher interest rates on deposits to attract funds when policy rates increase.

## What are the challenges and limitations of MCLR?

- It does not apply to fixed-rate loans, which constitute a significant portion of bank loans in India. Fixed-rate loans are still linked to the base rate or other benchmarks decided by banks.
- **It does not apply to loans given by non-banking financial companies (NBFCs)** and micro-finance institutions (MFIs), which cater to a large segment of customers who are unable to access bank credit.
- It does not address the issue of asset-liability mismatch for banks, as most deposits are short-term while most loans are long-term. This exposes banks to interest rate risk and liquidity risk.
- **It does not consider the impact of external factors such as exchange rate fluctuations**, global market conditions, etc., on the cost and availability of funds for banks.
- It may create volatility and uncertainty in loan pricing, as MCLR can change frequently depending on market conditions. This may affect both borrowers and lenders adversely.

## Way forward

- **Extending the applicability of MCLR to all types of loans**, including fixed-rate loans, and all types of lenders, including NBFCs and MFIs.
- **Developing a market-based external benchmark that can capture the cost and availability of funds for banks** from various sources, such as the wholesale market, money market, etc.
- Strengthening the supervision and regulation of banks by RBI to ensure compliance with MCLR rules and prevent malpractices and manipulation.
- **Educating and creating awareness among borrowers and lenders** about the features and benefits of MCLR and how it affects their loan pricing and repayment.
- Encouraging innovation and competition among banks to offer customized and flexible loan products that suit the needs and preferences of different customers.

## Conclusion

- MCLR is a step in the right direction to make the Indian banking sector more responsive, competitive and customer-friendly. It has the potential to boost economic growth and development by facilitating cheaper and easier access to credit. However, it requires constant monitoring and evaluation by RBI and other stakeholders to ensure its effectiveness and efficiency in achieving its objectives.

## 3.13   MULTILATERAL DEVELOPMENT BANKS

## Context

- The Union Finance Minister engaged with the World Bank Group President to discuss the involvement of multilateral banks in various sectors in India

## Multilateral Development Banks

- Multilateral development banks (MDBs) are **international financial institutions that provide loans, grants and technical assistance to developing countries for their economic and social development**.
- MDBs include the World Bank Group, the Asian Development Bank, the African Development Bank, the Inter-American Development Bank, etc.

### Background

- **MDBs originated in the aftermath of World War II to rebuild war-ravaged nations and stabilize the global financial system**. The World Bank, which has been semi-officially dominated by the U.S. since its founding, is one of these institutions.
- Over time, **MDBs expanded their scope and mandate to address various development issues** such as poverty reduction, infrastructure development, human capital formation, environmental sustainability, etc.

MDBs also diversified their membership and regional presence to reflect the changing global landscape.

### Features

- **They are owned and governed by their member countries, which are both borrowers and non-borrowers**. The voting power of each member is usually based on its shareholding or contribution to the bank's capital.
- **They prioritize development goals over profit motives**. They often lend at low or no interest or provide grants to fund projects that promote development. They also provide policy advice, technical assistance and knowledge sharing to support their clients.
- **They operate on the principle of multilateralism and cooperation**. They work with other MDBs, bilateral donors, private sector actors, civil society organizations and other stakeholders to leverage resources and partnerships for development.
- **They are subject to international law and norms**. They adhere to certain standards and safeguards to ensure the quality, effectiveness and accountability of their operations. They also have independent evaluation and grievance mechanisms to

address complaints and disputes.

## Significances

- MDBs play a significant role in supporting the development of both low-income and middle-income countries (LICs and MICs) by addressing issues such as:
  - **Poverty and inequality:** MDBs help reduce poverty and improve the living standards of millions of people in developing countries by providing access to basic services, social protection, education, health, etc.
  - **Infrastructure and connectivity:** MDBs help bridge the infrastructure gap in developing countries by financing projects in transport, energy, water, sanitation, urban development, etc. These projects enhance the connectivity, productivity and competitiveness of these countries.
  - **Human capital and innovation:** MDBs help foster human capital development and innovation in developing countries by investing in skills, education, research, technology transfer, etc. These investments enhance the capabilities and opportunities of these countries.
  - **Environmental sustainability and resilience:** MDBs help promote environmental sustainability and resilience in developing countries by supporting projects in climate change mitigation and adaptation, natural resource management, disaster risk reduction, etc. These projects protect the environment and reduce the vulnerability of these countries.

## Steps Taken by India

- India is an active member and borrower of several MDBs such as the World Bank Group (WBG), the Asian Development Bank (ADB), the New Development Bank (NDB), etc. India has taken various steps to leverage the potential of MDBs for its development. These include:
  - **Seeking more resources and influence:** India has advocated for increasing the capital base and voting power of MDBs to enhance their lending capacity and representation of developing countries. India has also contributed to the replenishment of concessional funds such as the International Development Association (IDA) of the WBG.
  - **Pursuing strategic partnerships:** India has forged strategic partnerships with MDBs to align their support with its national priorities such as infrastructure development, digital transformation, social inclusion, etc. India has also collaborated with MDBs on regional initiatives such as the South Asia Sub-regional Economic Cooperation (SASEC) program with ADB.
  - **Promoting new institutions:** India has played a leading role in establishing new MDBs such as the NDB and the Asian Infrastructure Investment Bank (AIIB) to address the emerging needs and aspirations of developing countries. India is also a founding member of the International Solar Alliance (ISA), which aims to mobilize finance for solar energy projects.

## Challenges

- **Outdated framework:** The current legal and institutional framework of MDBs is outdated and inadequate to deal with the rapid changes and complexities of the digital ecosystem. The current framework does not reflect the contemporary realities and aspirations of the developing countries, especially those of the Global South.
- **Suboptimal performance:** The current operation strategies and business models of MDBs are not optimal for meeting the diverse and evolving needs of developing countries in pursuing inclusive and sustainable development. The current strategies and models do not leverage the full potential of MDBs to mobilize resources and partnerships, foster policy dialogue and alignment, monitor and evaluate progress, and address gaps and challenges.

- **Governance and accountability issues:** The current governance structure of MDBs is not representative and responsive to the needs and interests of their shareholders and stakeholders. The current structure is dominated by the developed countries, especially the U.S. and Europe, which limits the voice and influence of the developing countries. The current structure also lacks transparency and accountability mechanisms to ensure the quality and effectiveness of MDBs' operations.

## Way Forward

- **Updating the framework:** The legal and institutional framework of MDBs should be updated to reflect the changing global context and the needs and aspirations of developing countries. The framework should also incorporate the principles of digital governance, such as inclusiveness, openness, interoperability, security, etc.
- **Enhancing the performance:** The operation strategies and business models of MDBs should be enhanced to provide tailored and flexible solutions for different contexts and sectors. The strategies and models should also support innovation and technology transfer for development solutions, especially for adaptation and resilience.
- **Improving governance and accountability:** The governance structure of MDBs should be improved to ensure a more balanced and representative voice and influence of their shareholders and stakeholders. The structure should also ensure more transparency and accountability mechanisms to ensure the quality and effectiveness of MDBs' operations.

## Conclusion

- MDBs are important actors in the global development landscape. They have contributed significantly to the development of developing countries by providing financial and technical assistance. However, MDBs also face several challenges that limit their relevance and performance in the changing global context. Therefore, there is a need to reform and strengthen MDBs to make them more responsive and effective in addressing the emerging challenges and opportunities in the digital space.

## 3.14 COASTAL SHIPPING POLICY

### Context

- The Union Minister for the Ministry of Ports, Shipping, and Waterways, led the discussion on the 'Coastal Shipping Policy' during the parliamentary consultative committee meeting.

### Key Highlights

- The handling of cargo in National Waterways has surged remarkably, experiencing a staggering 1700% increase from 6.83 MMT in 2013-14 to 126.15 MMT in 2022-23.
- The Ministry has set ambitious targets aiming for a total potential of 1300 MTPA cargo movement through coastal shipping by 2047, highlighting the significant role of coastal shipping in the transportation sector.
- **Several measures have been introduced to facilitate coastal vessels, including a priority berthing policy, green channel clearance, discounts on vessel and cargo-related charges by major ports**, and a reduction in GST on bunker fuels used in Indian Flag Vessels from 18% to 5%.
- The Ministry emphasizes the development of agglomeration centres, silo infrastructure, dedicated warehousing facilities, and improvements in the end-to-end logistics supply chain to further promote coastal shipping.

### Coastal Shipping

- India is a country with a long coastline of about 7500 km, which offers a great potential for coastal shipping as a mode of transportation. Coastal shipping is the

movement of cargo along the coast without crossing an ocean. It is an efficient, cost-effective, and environment-friendly way of transporting goods, especially bulky and heavy items.

## Background

- Coastal shipping has been practised in India since ancient times, as evidenced by the trade links with other countries in the Indian Ocean region. However, in the modern era, coastal shipping has been neglected due to various reasons such as lack of infrastructure, policy barriers, competition from road and rail transport, and low awareness among shippers and consignees.

- **According to the Ministry of Shipping, the share of coastal shipping in the total domestic cargo movement was only 6% in 2017-18, compared to 89% by road and 5% by rail**. This is despite the fact that coastal shipping is cheaper than road and rail transport by 60-80% and 50% respectively, and emits less carbon dioxide and other pollutants.

## Features

- **Cost-effective:** Coastal shipping can reduce the logistics cost by 60-80% compared to road and rail transport. This is because coastal shipping can carry larger volumes of cargo per trip with lower fuel consumption and maintenance costs.

- **Time-efficient:** Coastal shipping can reduce the transit time by 30-50% compared to road and rail transport. This is because coastal shipping can avoid congestion and bottlenecks on land routes and operate round the clock.

- **Safe and secure:** Coastal shipping can reduce the risk of accidents, thefts and damages compared to road and rail transport. This is because coastal shipping can avoid road mishaps, rail derailments and other hazards on land routes.

- **Environment-friendly:** Coastal shipping can reduce the carbon footprint by 70-80% compared to road and rail transport. This is because coastal shipping can emit less greenhouse gases per ton-km of cargo transported.

## Significances

- **Trade facilitation:** Coastal shipping can enhance the competitiveness of Indian exports and imports by reducing the logistics cost and time. This can improve India's trade balance and foreign exchange reserves.

- **Port-led development:** Coastal shipping can boost the development of ports and related infrastructure along the coast. This can create employment opportunities, income generation and regional growth.

- **Blue economy:** Coastal shipping can promote the sustainable use of marine resources for economic activities such as fisheries, aquaculture, tourism, renewable energy, etc. This can contribute to India's food security, energy security and climate resilience.

- **Coastal security:** Coastal shipping can strengthen the surveillance and patrolling of India's maritime borders by increasing the presence of coastal vessels. This can deter and counter threats from hostile actors such as pirates, terrorists and smugglers.

- **Social inclusion:** Coastal shipping can improve the connectivity and accessibility of remote areas such as islands, hinterland and northeast regions. This can enhance the quality of life, education and health care of the people living in these areas.

**Initiatives to Promote Coastal Shipping**

**The Sagarmala Programme was launched in 2015 to harness the potential of India's coastline and inland waterways for port-led development.** The programme envisages four pillars: port modernization and new port development; port connectivity enhancement; port-linked industrialization; and coastal community development. Under this programme, several projects have been identified to improve the infrastructure and connectivity of coastal shipping.

**The RORO Scheme was launched in 2016 to facilitate the movement of vehicles by sea instead of road.** Under this scheme, RORO vessels are exempted from customs and central excise duty on bunker fuels. The scheme also provides subsidy for RORO operations on select routes.

The **Coastal Berth Scheme was launched in 2015 to provide financial assistance to major ports and state governments for developing dedicated berths for coastal cargo at ports.** The scheme also covers capital dredging at major ports and construction of breakwaters for non-major ports.

The Draft National Policy on Coastal Shipping was released to provide a comprehensive framework for the development of coastal shipping in India. **The policy aims to increase the share of coastal shipping in domestic cargo movement from 6% to 12% by 2025.** The policy proposes various measures such as rationalization of tariffs and charges; simplification of documentation and procedures; promotion of coastal shipping as a green mode of transport; development of coastal shipping hubs; and creation of a coastal shipping fund.

## Challenges

- **Infrastructure gaps:** There is a need to upgrade the infrastructure and connectivity at ports and hinterland to facilitate the smooth movement of coastal cargo and passengers. This includes providing adequate depth, draft, equipment, storage, road and rail links, etc.

- **Regulatory hurdles:** There is a need to simplify and streamline the regulatory procedures and norms for coastal shipping to reduce the paperwork, clearances and inspections. This includes harmonizing the customs, security, safety, environmental and other regulations across states and agencies.

- **Market development:** There is a need to create awareness and demand among shippers and consumers for coastal shipping services. This includes providing reliable, regular and competitive services, creating a common platform for information sharing, booking and tracking, offering multimodal integration and end-to-end solutions, etc.

- **Human resource development:** There is a need to enhance the availability and quality of human resources for coastal shipping. This includes training and skilling the seafarers, port workers, operators and managers, providing attractive wages and working conditions, ensuring social security and welfare measures, etc.

- **Technological innovation:** There is a need to adopt and deploy new technologies for coastal shipping to improve the efficiency, safety and sustainability of operations. This includes using digital tools such as blockchain, IoT, AI, etc., adopting green technologies such as LNG, electric, hybrid, etc., developing smart ports and vessels with automation, etc.

## Way Forward

- **Strengthening the institutional framework:** There is a need to establish a dedicated authority or agency for coastal shipping at the central and state levels to coordinate, monitor and regulate the sector. This can help in ensuring policy coherence, stakeholder consultation, dispute resolution and grievance redressal.

- **Enhancing the financial support:** There is a need to increase the financial support for coastal shipping from various sources such as budgetary allocation, public-private partnership, multilateral funding, etc. This can help in mobilizing the resources required for infrastructure development, vessel acquisition, technology adoption, etc.

- **Expanding the scope of services:** There is a need to expand the scope of services offered by coastal shipping to cater to diverse segments of cargo and passengers. This includes exploring new routes such as east-west coast linkages, international routes such as SAARC countries, new types of cargo such as automobiles, agricultural products, etc., and

new modes of transport such as cruise tourism, water taxis, etc.

- **Building the capacity of stakeholders:** There is a need to build the capacity of various stakeholders involved in coastal shipping such as port authorities, shipping companies, logistics providers, shippers, consumers, etc. This includes providing training, awareness, guidance, incentives, recognition, etc.

- **Promoting best practices:** There is a need to promote best practices from other countries that have successfully developed their coastal shipping sectors such as China, Japan, Norway, etc. This includes learning from their policies,

strategies, models, experiences, etc.

## Conclusion

- Coastal shipping is an important mode of transportation that can offer multiple benefits for India's economy and society. The government has taken several initiatives to promote coastal shipping in the country but there are still many challenges that need to be addressed. By adopting a holistic approach that involves infrastructure development, policy reform, market creation, human resource development and technological innovation, India can unlock the full potential of its coastline and waterways for port-led development and blue economy.

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## 3.15  INDIA SKILLS REPORT 2024

### Context

- The India Skills Report 2024 highlighted Kerala as the most preferred state to work based on a survey conducted across 3.88 lakh youths through a National Employability Test.

### Why did Kerala emerge as top preference for employment?

#### Overall Employability and Skills

- Kerala was credited for its balanced approach to education and nurturing future skills, leading to an improved overall national employability rate of 51.25% among assessed youths.

- Kerala secured the second position in overall employability among the 18-21 age group, emphasizing its reputation as a strong talent pool in the country.

- Kerala showcased a diverse talent pool, excelling in domains like B.E./BTech, polytechnic skills, and English proficiency.

#### Government Initiatives

- The report acknowledged the State government's robust initiatives, particularly ASAP Kerala's role in imparting skills to over 2.5 lakh higher secondary students over the last decade.

- Community skill parks and centres of excellence established by the agency were

recognized as exemplary models for advanced technology training, contributing to Kerala's skilled workforce.

### India Skills Report 2024

- The India Skills Report (ISR) is an annual publication that provides insights into the talent demand and supply in India, as well as the employability trends and patterns across various demographics.

- The **report is based on the evaluation of 3.88 lakh candidates who took the Wheebox National Employability Test (WNET)** across India and the feedback from 152 corporations from 15 diverse industries who participated in the India Hiring Intent Survey for 2024.

- The report highlights the remarkable achievements of both the public and private sectors in enhancing the talent landscape at local, national and international levels, and also conducts a comprehensive analysis of the employability of India's youth across various parameters.

#### Positives

- **Rising Employability:** The overall increase in youth employability to 51.25% is a positive sign, indicating progress in skilling initiatives.

- **Strong AI Position:** India's leadership in AI skill penetration and talent concentration

positions it well for the future of work, where AI is expected to play a significant role.

- **Regional Variations:** The report highlights the need for targeted interventions to address regional disparities in employability. Kerala's success story provides valuable insights for other states.
- **Industry Focus:** Identifying emerging skill sets in demand across various industries helps guide future training programs and career choices.
- **Collaboration Emphasis:** The report rightly emphasizes the importance of collaboration between government, businesses, and educational institutions to bridge the skill gap and ensure inclusive upskilling.

## Challenges

- **Persistent Skill Gap:** Despite the improvement, a significant portion of the youth population remains underemployed or unemployed due to a lack of relevant skills.
- **Unequal Access to Skilling:** Access to quality skilling opportunities remains uneven, particularly in rural areas and for marginalized communities.
- **Quality of Training:** The quality of skilling programs needs further improvement to ensure they are aligned with industry needs and equip graduates with the necessary skills.
- **Reskilling and Upskilling:** The rapidly evolving job market demands continuous learning and upskilling, which requires robust infrastructure and support mechanisms.
- **AI Integration:** The report suggests integrating AI into learning processes to enhance training effectiveness and prepare individuals for AI-driven jobs.

## Further Analysis

- Understanding the reasons behind these variations can inform targeted interventions.
- The report should provide insights into the gender gap in employability and suggest strategies to bridge it.
- Analyzing the mismatch between available skills and industry demand can help identify critical skill gaps and tailor training programs accordingly.
- The report should assess the long-term impact of the pandemic on the skill landscape and propose strategies to address emerging challenges.

## Conclave

- The India Skills Report 2024 provides valuable insights into the current state of skilling in India and its future trajectory. However, it's crucial to delve deeper into the challenges and explore specific solutions for continuous improvement and ensuring inclusive skills for all.

## 3.16 SHORT ARTICLES

# Index of Eight Core Industries

## Context

- The combined Index of Eight Core Industries (ICI) increased by 12.1% in October 2023 compared to October 2022.

## Index of Eight Core Industries (ICI)

- It is a **monthly production volume index** that measures the performance of eight core industries in India.
- **These eight industries comprise 40.27%** of the weight of items included in the Index of Industrial Production (IIP), which is a broader measure of industrial activity in the country.
- It is **released by the Office of Economic Adviser, Department for Promotion of Industry and Internal Trade (DPIIT), under the Ministry of Commerce and Industry.**
- It is **based on the year 2011-12 as the base year**, which means that the production volumes of each industry in that year are assigned a value of 100. The production volumes of subsequent years are then compared to the base year to calculate the percentage change.

o For example, if the ICI for coal in October 2023 is 112.1, it means that the coal production in October 2023 was 12.1% higher than the coal production in 2011-12.

**Current Figures of Weightage of Eight Core Industries**

| Industry | Weightage Percentage | Industry | Weightage Percentage |
|---|---|---|---|
| Refinery Products Industry | 28.04 % | Crude Oil Industry | 8.98 % |
| Electricity Industry | 19.85 % | Natural Gas Industry | 6.88 % |
| Steel Industry | 17.92 % | Cement Industry | 5.37 % |
| Coal Industry | 10.33 % | Fertilizers Industry | 2.63 % |

**Conclusion**

- The ICI is an important indicator of the health and growth of the Indian economy, as it reflects the performance of key sectors that have a significant impact on employment, income, investment, exports, imports, inflation and fiscal balance. It also provides insights into the demand and supply conditions in various industries, as well as their contribution to the overall GDP.

# ILO Report on Working Environments

**Context**

- The report released by the International Labour Organization (ILO) titled 'A Call for Safer and Healthier Working Environments' provides a comprehensive overview of the global scenario regarding work-related deaths and emphasizes the urgency for enhanced safety measures.

**Key Highlights of the Report**

**Global Impact**

- **Approximately 3 million workers die annually due to work-related accidents and diseases**. More than 63% of these deaths occur in the Asia-Pacific region.

**Causes of Deaths**

- Long working hours (55 hours or more per week) are identified as the primary cause, resulting in nearly 7.45 lakh deaths in 2016.
- Exposure to occupational particulate matter, gases, and fumes accounted for around 4.5 lakh deaths.
- Occupational injuries caused approximately 3.63 lakh deaths.
- Sectors such as mining and quarrying, construction and utilities are identified as the most hazardous globally.

**ILO Conventions**

- Out of 187 member countries, 79 have ratified the ILO Occupational Safety and Health Convention, and 62 have ratified the Promotional Framework for Occupational Safety and Health Convention, 2006. **India has not ratified either of these conventions.**

**Work-Related Diseases and Accidents**

- A significant portion of work-related deaths (26 lakh) is attributed to work-related diseases.
- Work accidents resulted in 3.3 lakh deaths.
- Circulatory diseases, malignant neoplasms, and respiratory diseases are highlighted as major contributors to work-related deaths.

**Recommendations**

- **The ILO calls for five categories of "Fundamental Principles and Rights at Work" to ensure safety and health at work**, including freedom of association, elimination of forced labour, abolition of child labour, elimination of discrimination, and a safe and healthy working environment.

> **International Labour Organization (ILO)**
> - It is a **specialized agency of the United Nations** dedicated to promoting social justice and internationally recognized human and labour rights.
> - The ILO was **founded in 1919 as part of the League of Nations**, making it one of the oldest UN agencies.
> - It is composed of representatives from governments, employers and workers of its 187 member states, who work together to formulate policies and programmes that foster decent work for all.
> - **It operates through a tripartite structure involving governments, employers, and workers**. It brings together representatives from these groups to negotiate and adopt international labour standards, known as Conventions and Recommendations.
>   - These standards cover various aspects of labour rights, including freedom of association, collective bargaining, child labour, forced labour, equal remuneration, occupational safety and health, and more.
> - It provides technical assistance and expertise to member states, conducts research, and offers training programs aimed at promoting decent work and improving working conditions worldwide.

## Conclusion

- The report underscores the urgent need for global action to address work-related fatalities. It emphasizes the importance of implementing robust safety measures, ratifying essential conventions, and prioritizing the fundamental rights and well-being of workers across different industries and regions.

# Purchasing Managers Index

## Context

- Manufacturing rebounded in November with increased new orders and production volumes, driving output expansion above trend.

## Key Highlights

- The seasonally adjusted S&P Global India Manufacturing Purchasing Managers' Index (PMI) rose to 56 in November from 55.5 in October. This indicates a slight rebound in manufacturing sector activity.
- With rising new sales and positive demand conditions, Indian manufacturers increased production volumes. Output expanded sharply and at an above-trend pace.
- **Input costs inflation eased to a 40-month low**. Producers chose to raise output costs at the slowest pace in seven months.
- Surveyed firms had a favourable outlook on prospects in November, citing opportunities in demand strength, marketing initiatives, and new clients showing interest in various products.

- While there was a positive outlook, there were concerns about potential price increases in the near term, as reflected in the data for business sentiment.

**Purchasing Managers Index (PMI)**

- The Purchasing Managers Index (PMI) is a widely used indicator of the economic health of the manufacturing sector.
- **PMI data is released by S&P Global** - a global major in financial information and analytics. Earlier PMI data in India was released by IHS Markit before its merger with S&P.
- The PMI is based on a **monthly survey of supply chain managers across 19 industries**, covering both upstream and downstream activity.
- **It summarizes the opinions of these executives on five key variables**: new orders (30%), output (25%), employment (20%), suppliers' delivery times (15%) and stock of items purchased (10%).
- **The PMI is calculated as:**
  - Each variable is given a weight, and each response is assigned a value. The PMI is then computed as the sum of the

products of the weights and the values, multiplied by 100.

- o **A PMI above 50 indicates that the manufacturing sector is expanding, while a PMI below 50 signals a contraction.**
- It is a valuable tool for investors, policymakers, and business leaders, as it provides timely and reliable information on the state of the manufacturing sector.
- It can also help forecast future economic trends, as changes in the PMI often precede changes in other indicators such as industrial production, GDP growth, and employment.

## Conclusion

- The manufacturing sector in India appeared to be in good shape as of November, with sustained new order growth, positive employment trends, and a favourable outlook for the future. The article suggests that the manufacturing economy is expected to perform strongly as the year comes to a close, with expectations for continued strength in 2024.

# The State of Food and Agriculture 2023

## Context

- According to a report released by the United Nations Food and Agriculture Organisation (FAO), the massive hidden costs of our global agrifood systems exceed $10 trillion.

## Details

- The report from the **Food and Agriculture Organization (FAO) titled 'The State of Food and Agriculture 2023'** brings attention to the substantial hidden costs associated with unhealthy diets and the consumption of ultra-processed foods, outlining key findings and proposing strategies to address this global concern.
- The report sheds light on the immense **hidden costs associated with our global agrifood systems,** surpassing $10 trillion, particularly impacting middle-income countries like India where these costs amount to nearly 11% of the GDP.

- These costs manifest in various ways, influencing poverty rates, environmental degradation, and health-related issues like undernourishment and unhealthy dietary patterns.

## Key Findings of the Report

### Hidden Costs of Unhealthy Diets

- **Unhealthy diets, especially those high in ultra-processed foods, incur hidden costs surpassing USD 7 trillion annually** due to health-related issues like obesity and non-communicable diseases.
- These costs account for nearly 10% of the global GDP, predominantly affecting upper-middle-income and high-income countries.

### Impact on India

- **India incurs hidden costs of approximately USD 1.1 trillion in its agrifood systems**, ranking third globally after China and the United States.
- The burden of disease, social costs of poverty, and environmental costs constitute significant shares of hidden costs in India.

### Rapid Spread of Processed Foods

- **Highly processed food consumption is rising,** influenced by factors like urbanization, lifestyle shifts, and changing employment profiles.
- Contrary to beliefs, processed food consumption patterns show similarities across both urban and rural areas.

### Global Food Insecurity

- Moderate or severe food insecurity remains relatively unchanged but significantly higher than pre-pandemic figures, affecting around 29.6% of the global population.
- While undernourishment rates in India have decreased, the country still has a substantial number of undernourished individuals compared to other South Asian nations.
- **In South Asia, India ranks third in undernourishment, highlighting the prevalence of this issue in the country.**

### Future Projections

- The report projects a rise in chronic undernourishment by 2030, potentially affecting nearly 600 million people.

### Strategies to Reduce Ultra-processed Food Burden:

- **Promoting Diverse and Nutritious Foods:** Encouraging the production and consumption of diverse, nutritious, and less processed foods like fruits, vegetables, legumes, nuts, seeds, and whole grains.
- **Regulation and Taxation:** Implementing regulations on marketing, labelling, and taxation of ultra-processed foods while incentivizing healthier options.
- **Enhancing Accessibility:** Improving access and affordability of healthy foods, especially for vulnerable groups, through social protection, food assistance, and public procurement.
- **Educating Consumers:** Empowering consumers through nutrition education, behavioural change communication, and digital technologies to make informed and healthier food choices.
- **Improving Efficiency:** Enhancing the efficiency of agrifood systems by reducing food losses, improving resource use, and adopting cleaner energy sources.
- **Strengthening Governance:** Engaging multiple stakeholders, fostering innovation, research, and monitoring the impacts to ensure effective governance of agrifood systems.

### Conclusion

- The report emphasizes the need for a fundamental transformation in global agrifood systems, advocating for diversified, sustainable farming practices that consider ecological, economic, and nutritional aspects while addressing the challenges faced by farmers and the environment.

# Pressmud

### Context

- The utilization of Pressmud in the production of compressed biogas (CBG) in the Indian sugar industry is a promising and sustainable initiative.

### Details

- **Pressmud, also known as filter cake or press cake, is a by-product of the sugar industry**. It's the solid residue left over after sugarcane juice is extracted and filtered during sugar production. While initially considered waste, pressmud has gained attention for its potential uses in various industries.
- .**Uttar Pradesh and Maharashtra, being significant contributors to sugarcane cultivation**, play a crucial role in the regional production of pressmud. Understanding the regional dynamics is essential for effective implementation and scaling of CBG projects.



### Significance of Pressmud Utilization

- **It serves as a valuable resource for the production of biogas through anaerobic digestion**. The subsequent purification of biogas into compressed biogas (CBG) contributes to the generation of green energy.
- The adoption of pressmud for CBG production provides an additional revenue stream for sugar mills. This diversification helps sugar mills become more financially resilient.
- The expansion of the ethanol biofuel sector, driven in part by pressmud utilization, has further boosted the overall sugar industry, aligning with global trends towards sustainable and renewable energy sources.

### Advantages of Pressmud as Feedstock

- The use of pressmud **streamlines the feedstock supply chain**, eliminating complexities associated with other sources like agricultural residue.
- Pressmud's consistent quality ensures stable performance in biogas production, avoiding complications related to variations in feedstock quality.
- **Pressmud's lower cost compared to other potential feedstocks** enhances the economic viability of CBG production, contributing to the overall competitiveness of the industry.

### Challenges and Necessary Interventions

- **The rise in pressmud prices necessitates strategic interventions to control costs**, ensuring that the economic viability of CBG production is maintained.
- Addressing challenges related to the storage and gradual decomposition of pressmud is crucial to prevent disruptions in CBG plant operations and control production costs.

### Potential of CBG Generation and Necessary Interventions

- **State-level implementation of bioenergy policies** can provide a regulatory framework, streamline project approvals, and incentivize CBG production.
- **Mechanisms to stabilize pressmud prices** and encourage long-term agreements between sugar mills and CBG plants are vital for sustained economic stability.
- Ongoing research on storage technologies can mitigate challenges associated with methane emissions and gas loss during pressmud utilization.
- **Providing training sessions for operators and stakeholders** ensures efficient CBG plant operations and proper handling of pressmud as feedstock.

### Conclusion

- Pressmud's conversion into CBG represents a win-win scenario, addressing waste management in sugar mills, contributing to sustainable energy production, and offering organic fertilizer for agriculture. The success of this initiative relies on effective policies, economic stability, technological advancements, and a well-trained workforce.

# Off Budget Borrowings

### Context

- India's recent years have seen a rise in off-budget borrowings, a practice where states incur debt through entities like public sector units (PSUs) or special purpose vehicles (SPVs), but the burden of repayment falls on the government's budget.

### Details

- **Off-budget borrowings are debts incurred by entities other than the government itself, but the principal and interest are ultimately paid from the government budget.**
- These debts are typically raised by public sector units (PSUs) or special purpose vehicles (SPVs) set up by the government.
- They **escape legislative oversight and allow governments to bypass borrowing limits set under the FRBM Act.**

### Main reasons for the rise of off-budget borrowing:

- Official budget allocations require legislative approval, which can be time-consuming and politically challenging. Off-budget borrowings can bypass this process, offering states greater flexibility and speed in accessing funds.
- The **Fiscal Responsibility and Budget Management (FRBM) Act sets limits on how much a state can borrow officially**. Off-budget borrowing allows states to exceed these limits without raising immediate concerns about fiscal discipline.

### What are the concerns?

- **These borrowings are not reflected in the official budget**, making it difficult to track the true state of government finances and assess overall fiscal health.

- **It can lead to unsustainable levels of debt,** as the true extent of the liability is not readily apparent.
- The lack of transparency can make it harder to hold governments accountable for their financial decisions.

## Central government has taken steps to address the issue of off-budget borrowing:

- In March 2022, the Union Government declared that state off-budget borrowings would count towards their regular borrowing ceiling, effectively limiting their ability to use this practice.
- The Centre itself had used off-budget borrowings in the past, but has committed to ending them completely and successfully reduced them to zero in 2022-23.

## Challenges and the future outlook

- Many states still have higher-than-target fiscal deficits, even with the limitations on off-budget borrowing.
- Both the Centre and states need to prioritize responsible fiscal management and adhere to borrowing limits.
- **Continued monitoring and enforcement mechanisms are crucial** to ensure complete adherence to new policies and prevent future misuse of off-budget practices.

## Conclusion

- Addressing the issue of off-budget borrowing requires a sustained commitment to transparency, fiscal discipline, and responsible economic management at both the central and state levels.

# Codex Alimentarius Commission

## Context

- India received praise from the Codex Alimentarius Commission (CAC) for its standards on millets.

## Details

- Millets are a diverse group of ancient grains known for their nutritional value and resilience in harsh environments. However, their consumption has declined in recent years due to various factors.

- India developed a **comprehensive group standard for 15 types of millets**, **specifying eight quality parameters including moisture content, impurities, and grain quality.** This standard received praise from the CAC, highlighting its thoroughness and potential global impact.
- India proposed **developing global standards for five specific millet varieties:** finger millet, barnyard millet, kodo millet, proso millet, and little millet. This proposal, based on India's existing standards, was unanimously accepted by the CAC, marking a significant step towards promoting these millets globally.

## Implications and Future Steps

- India's comprehensive millet standards will **serve as a strong foundation for developing global standards for the five chosen varieties**. This will improve harmonization in international trade and ensure the consistent quality of these products.
- Global standards for millets will likely i**ncrease awareness and promote their consumption worldwide.** This can lead to improved nutrition, particularly in regions facing food insecurity, and support sustainable agricultural practices.

## Codex Alimentarius Commission (CAC)

- It serves as a global authority for food standards, **operating under the joint governance of the Food and Agriculture Organization (FAO) and the World Health Organization (WHO).**
- **Established in 1963,** it brings together over 190 member countries and the European Union to create international standards, guidelines, and codes of practice concerning various aspects of food production, safety, and trade.

## Core Objectives

- It aims to **protect consumer health by setting standards** that minimize the risks of foodborne illnesses and guarantee food quality.
- **By harmonizing food standards across nations**, it creates a level playing field for food producers and exporters, promoting fair trade practices globally.

- By reducing technical barriers arising from differing food regulations, CAC facilitates a smoother international food trade.
- **It contributes to sustainable food production and consumption** by endorsing responsible food practices and minimizing food waste.

## Operational Mechanism

- The CAC operates through specialized committees and task forces, each dedicated to specific food categories or issues (e.g., dairy, meat, food hygiene).
- These groups engage in a thorough process involving scientific reviews, stakeholder consultations, and consensus decision-making to develop and revise Codex standards.
- Although **Codex standards are not legally binding on member countries**, they serve as influential benchmarks and often form the basis for national food regulations.

## Benefits and Impact

- It helps to ensure food safety and reduce the risk of foodborne diseases.

- It facilitates international food trade by harmonizing food standards and regulations.
- It raises awareness and promotes better food safety practices around the world.

## Challenges and Opportunities

- Keeping up with the evolving scientific evidence and technologies in the food sector is a continual challenge.
- Ensuring transparency and inclusivity in the standard-setting process, particularly for developing countries, remains crucial for fair representation.
- Addressing new food safety threats such as antimicrobial resistance and climate change impacts remains a pressing concern.

## Conclusion

- The Codex Alimentarius Commission plays a critical role in setting international food standards, promoting fair trade, and ensuring the safety and quality of food globally while adapting to evolving challenges in the food industry.

# Developmental Assistance from Asian Development Bank (ADB)

## Context

- The Government of India and the Asian Development Bank (ADB) have partnered in a $200 million loan agreement aimed at enhancing Uttarakhand's power supply infrastructure through the Uttarakhand Climate Resilient Power System Development Project.

## Key Highlights

- **Improving Infrastructure:** The project targets enhancing the quality, efficiency, and reliability of power supply in Uttarakhand.
- **Integration of Renewable Energy:** The initiative aims to modernize the power system network, enabling better integration and transmission of renewable energy sources to load centres. This modernization will help reduce power outages and technical losses.
- **Empowering Rural Communities:** Women self-help groups in rural hilly districts will benefit from access to renewable energy sources and energy-efficient equipment, enhancing their livelihoods. Training programs will focus on energy conservation and business management, with awareness campaigns in schools to promote employment opportunities in the energy sector.
- **Capacity Development:** ADB will aid in the capacity development of the Power Transmission Corporation of Uttarakhand Limited and the Uttarakhand Power Corporation Limited. This includes leadership courses, project management programs, and collaborating on formulating an energy transition roadmap to support Uttarakhand's low-carbon transition.

## Conclusion

- This collaboration between the Government of India and ADB reflects a significant step toward enhancing power infrastructure in Uttarakhand, with a focus on sustainability, resilience, and empowering local communities.

## Asian Development Bank (ADB)

It is a regional development bank that was established in 1966 with the aim of promoting social and economic development in Asia and the Pacific.

The ADB's operations are guided by its Strategy 2030, which sets out seven operational priorities for the bank:
1. Addressing remaining poverty and reducing inequalities.
2. Accelerating progress in gender equality.
3. Tackling climate change, building climate and disaster resilience, and enhancing environmental sustainability.
4. Making cities more livable.
5. Promoting rural development and food security.
6. Strengthening governance and institutional capacity.
7. Fostering regional cooperation and integration.

It is owned by 68 members, of which 49 are from the Asia and the Pacific.

The ADB's headquarters are located in Manila, Philippines, and it also has 31 field offices across the region.

The ADB is an official observer of the United Nations and a member of various global and regional initiatives, such as the G20, the Paris Agreement on climate change, the Sustainable Development Goals (SDGs), and the Association of Southeast Asian Nations (ASEAN).

The ADB's largest shareholders are Japan and the United States, each holding 15.6% of the total shares. China holds 6.4%, India holds 6.3%, and Australia holds 5.8%.

# Logistics Ease Across Different State (LEADS) Report

## Context

- The Logistics Ease Across Different States (LEADS) perception survey conducted by the Union Ministry of Commerce and Industry sheds light on the logistics challenges faced by Indian states and their performance in this crucial aspect.

## Key Highlights of the Report

### Landlocked States

- **Improvement in Scores:** Landlocked states have shown improvement in various parameters, including road quality, terminals, cost of logistics, and availability of skilled workforce compared to 2019.
- **Export Concentration:** Despite improvements, a significant portion of the country's exports (70%) is contributed by only five states: Gujarat, Tamil Nadu, Karnataka, Maharashtra, and Telangana. This concentration creates income and job generation gaps between landlocked and coastal states.
- **Challenges:** States like Bihar, Himachal Pradesh, Jharkhand, and Chhattisgarh received lower scores on road and terminal quality. Jharkhand, in particular, scored below average across all indicators.

### North-East Group

- **Contribution to GDP:** The North Eastern states contribute 2.8% to India's GDP and require substantial logistics-related improvements. The survey shows marked improvement since 2019.
- **State-Specific Challenges:** Manipur faces lower-than-average user satisfaction levels. While Assam performed better than average, Meghalaya's user performance assessment was below the North-East Group average.

### Coastal States

- **Export Contribution:** Coastal states contribute significantly to exports, with nine states accounting for 75% of total exports.
- **Performance Challenges:** Goa, Odisha, and West Bengal lag below the average among coastal states. Despite improvement in Odisha's logistics perception since 2019, it remains below the Coastal Group average.

### Overall Implications

- **Competitiveness Concerns:** Enhanced logistics competitiveness is crucial for India to compete with countries like Vietnam and Indonesia. Despite increased infrastructure spending, deep-seated logistical issues persist, affecting Indian manufacturing and exports.
- **Regional Disparities:** The concentration of exports in a few states and disparities in logistics performance among landlocked and coastal states emphasize the need for a more balanced and inclusive logistics development approach.

### Conclusion

- The LEADS survey underscores the importance of logistics efficiency in bolstering India's competitiveness,

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particularly as it aims to position itself as an alternative to manufacturing hubs like China. Addressing challenges in infrastructure and regional disparities will be pivotal for the country's economic growth and export performance.

# Migration and Development Briefs Report

## Context

- According to the latest Migration and Development Brief from the World Bank, remittances to low- and middle-income countries (LMICs) increased by 3.8% in 2023, a slower pace than the previous two years.

## General Trends

- In 2023, remittance flows to LMICs reached an estimated $669 billion, supported by resilient labour markets in advanced economies and Gulf Cooperation Council (GCC) countries.
- Remittance inflows grew for Latin America and the Caribbean (8%), South Asia (7.2%), East Asia and the Pacific (3%), and Sub-Saharan Africa (1.9%).
- Flows to the Middle East and North Africa fell for the second year (-5.3%), and remittances to Europe and Central Asia also fell (-1.4%).
- **The top five remittance recipient countries in 2023 are India ($125 billion), Mexico ($67 billion), China ($50 billion),** the Philippines ($40 billion), and Egypt ($24 billion).

## Implications and Future Outlook

- Due to weaker global economic activity, the growth of remittances to LMICs is expected to soften further to 3.1% in 2024.
- Downside risks include volatile oil prices, currency exchange rates, and a deeper-than-expected economic downturn in high-income countries.
- High inflation and subdued global growth are affecting the amount of money migrants can send to their families.

## Remittance Costs

- Remittance costs remain persistently high, averaging 6.2% to send $200 as of the second quarter of 2023.

- Banks are the costliest channel for sending remittances (average cost of 12.1%), followed by post offices (7%), money transfer operators (5.3%), and mobile operators (4.1%).

## Diaspora Bonds and Development

### Leveraging Remittances for Development

- Remittances are one of the few sources of private external finance expected to continue growing.
- Diaspora bonds can be leveraged for private capital mobilization to support development finance, providing a more stable source than short-term non-resident deposits.

### Sovereign Ratings and Debt Position

- Future inflows of remittances can be used as collateral to lower the costs of international borrowings by developing countries.
- Remittances can contribute to improving a country's sovereign ratings and its ability to repay debt.

## Regional Remittance Trends

- **East Asia and the Pacific:** Remittances increased by an estimated 3% to reach $133 billion in 2023. Excluding China, remittances to the region grew an estimated 7% to $83 billion in 2023.
- **Europe and Central Asia:** Remittance flows are estimated to have declined by 1.4% to $78 billion in 2023. Depreciation of the Russian ruble against the U.S. dollar has impacted the value of money transfers from Russia.
- **Latin America and the Caribbean:** Remittance flows are expected to increase by 8% to reach $156 billion in 2023. Remittances to Mexico, the largest recipient, are projected to increase by 9.7%.
- **Middle East and North Africa:** Remittance flows are expected to decline again in 2023 by about 5.3% to $61 billion. The sharp drop in flows to Egypt contributes to the decline.
- **South Asia:** Remittances are estimated to have grown 7.2% in 2023 to reach $189 billion. India's remittance flows are expected to beat previous forecasts and reach $125 billion in 2023.

- **Sub-Saharan Africa:** Remittances are expected to have increased by about 1.9% in 2023 to $54 billion. Strong remittance growth in Mozambique, Rwanda, and Ethiopia.

## Conclusion

- The report emphasizes the importance of remittances in financing current account and fiscal shortfalls in many economies while highlighting the need for an inclusive labour market and social protection policies for migrants.

# Self-Regulatory Organizations

## Context

- The Reserve Bank of India (RBI) recently introduced a draft 'Omnibus Framework' designed to recognize and establish Self-Regulatory Organizations (SROs) responsible for overseeing Regulated Entities (REs) within the financial sector.

## Details

- The primary aim is to improve industry standards through self-regulation, keeping pace with the rapid growth and technological advancements witnessed by these entities. The RBI has invited feedback from stakeholders on this draft framework.

## Key Highlights of the Draft Framework

- **Need for SROs:** The growth and complexity of regulated entities, coupled with technological advancements and increased customer outreach, have made effective regulation by the RBI challenging.
- **Parameters of the Framework:** The draft framework outlines parameters such as objectives, responsibilities, eligibility criteria, governance standards, and the application process for SRO recognition.
- **Existing SROs:** Recognized SROs will continue to operate under their existing terms unless this framework specifically extends to them.
- **Objectives and Responsibilities of SROs:** SROs are expected to set overarching objectives focusing on sector improvement, professionalism, compliance, innovation, and ethical conduct. Emphasis is placed on developing and adhering to self-regulatory principles and practices conducive to sector advancement while avoiding conflicts of interest.

- **Promoting Compliance and Best Practices:** SROs are tasked with promoting compliance by establishing codes of conduct, providing guidance and support, particularly to smaller entities, and sharing best practices aligned with regulatory policies. They should also establish benchmarks for professional market conduct among members.

- **Protection of Stakeholder Interests:** SROs are expected to safeguard the interests of customers, depositors, participants, and other stakeholders within the sector. Collaboration with the RBI is encouraged to ensure better compliance, sector development, stakeholder protection, innovation, and early warning signal detection.

- **Role as a Bridge and Standards of Operation:** SROs are to act as intermediaries between REs and the RBI, operating with transparency, professionalism, and independence to instil confidence in the sector's integrity. Adherence to the highest governance standards is crucial for effective SRO operations.

## Next Steps

- The final framework will consider stakeholder comments.
- The RBI will issue a separate notification inviting applications for SROs within the broader contours of the final framework.

## Conclusion

- This framework aims to enhance sector professionalism, compliance, and ethical conduct through self-regulation while fostering collaboration between SROs and the RBI for the overall development and integrity of the financial sector.

# PLI 2.0 for Steel Sector

## Context

- The Union Minister of State for Steel, announced that the government is working on a new version of the Production Linked Incentive (PLI) scheme specifically for the steel sector to incentivize production and address raw material supply issues.

**Key Highlights**

- **Concerns and Industry Growth:** Despite a strong recovery in steel production and consumption post-pandemic, concerns persist regarding rising imports, especially from countries like China and Vietnam. The industry expects growth in both production and demand in 2024, largely driven by infrastructure projects.
- **Targets and Initiatives:** India has set ambitious targets, aiming to achieve an installed steel manufacturing capacity of 300 MT by 2030, nearly doubling the current capacity. To achieve this, the government plans to encourage the use of newer technologies, including artificial intelligence, to boost production and reduce carbon emissions.
- **Challenges and Expectations:** The Indian Steel Association (ISA) highlights concerns over high raw material prices and excessive reliance on imports for coking coal, which accounts for 90% of the country's requirements. They anticipate government intervention to curb imports and safeguard the domestic market.
- **Import-Export Dynamics:** While finished steel imports into India have increased, exports have seen a decline, posing challenges for domestic producers. ISA expects steel production to reach around 123-127 MT in the fiscal year 2024.
- **Government Support and Collaboration:** The government is actively involved in facilitating the expansion of steel capacities by assisting in project clearances and engaging with state governments. Additionally, efforts are underway to explore alternative sourcing options for coking coal and address import-related challenges.

**Challenges faced by the Steel sector**



Steel Sector in India

Present Scenario:
- India is the world's second-largest producer of crude steel, with an output of 125.32 million tonnes (MT) in FY23.
- The industry has experienced substantial growth over the past decade, witnessing a 75% increase in production since 2008.
- Per-capita consumption of steel in India was 86.7 kilograms in FY23.
- The National Steel Policy projects a crude steel capacity of 300 MT, production of 255 MT, and a per capita consumption of 158 kgs by 2030-31.

Significance:
- Steel is a key sector for the Indian economy, contributing 2% to the country's GDP in FY 21-22.
- The steel industry plays a pivotal role in critical sectors like construction, infrastructure, automobile, engineering, and defense.

- **Investment Barriers:** Significant investment required for establishing modern steel plants (around Rs 7000.00 crores for a 1-tonne capacity plant) poses challenges.
- **Cyclical Demand:** Cyclical demand influenced by factors like monsoons creates financial challenges for steel plants.
- **Low Per Capita Consumption:** India's low per capita consumption of steel reflects economic disparities and affects the incentive to establish large-scale steel plants.
- **Technology and Research:** Historical low investment in technology and research leads to dependence on international research, incurring additional costs.
- **Slow Adoption in Construction:** The slow adoption of steel in construction due to adherence to traditional methods hinders the industry's growth.
- **Environmental Concerns:** The steel industry is a significant producer of carbon dioxide, facing challenges related to decarbonization.
- **EU's CBAM Impact:** The EU's Carbon Border Adjustment Mechanism (CBAM) starting from January 2026 is expected to adversely impact India's exports of metals to the EU, imposing additional scrutiny.
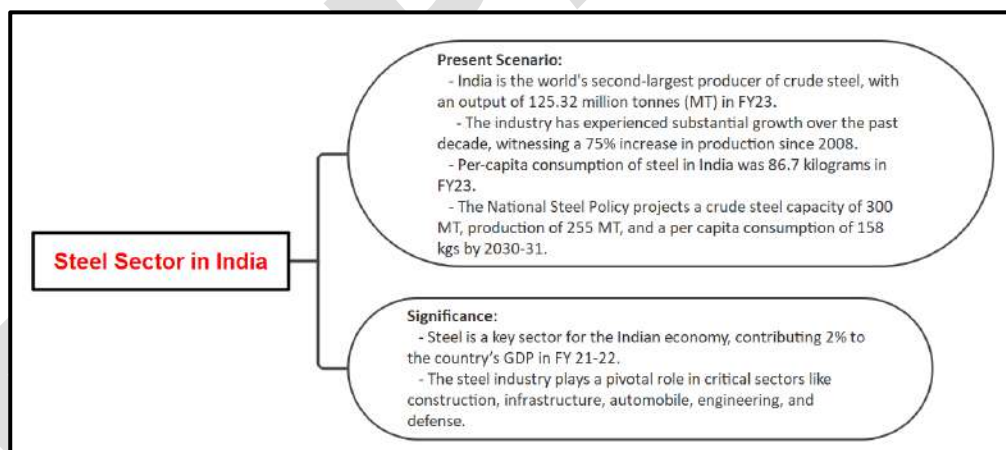
## Conclusion

- The steel sector in India is poised for significant growth, but challenges like import surges and raw material dependencies need to be effectively managed. The government's proposed PLI 2.0 and focus on technology adoption could potentially address some of these concerns while supporting the industry's expansion.

# Sub-Schemes under RAMP Programme

## Context

- The Union Minister for MSME has launched three sub-schemes under the RAMP programme.

## Key Highlights

- The launch of these three sub-schemes under the RAMP program is a significant step towards fostering growth and innovation within the MSME sector.

## MSME Green Investment and Financing for Transformation Scheme (MSE GIFT Scheme)

- This scheme aims to facilitate the adoption of green technology among MSMEs. It offers support through interest subvention and credit guarantees, encouraging MSMEs to embrace environmentally friendly practices.

## MSE Scheme for Promotion and Investment in Circular Economy (MSE SPICE Scheme)
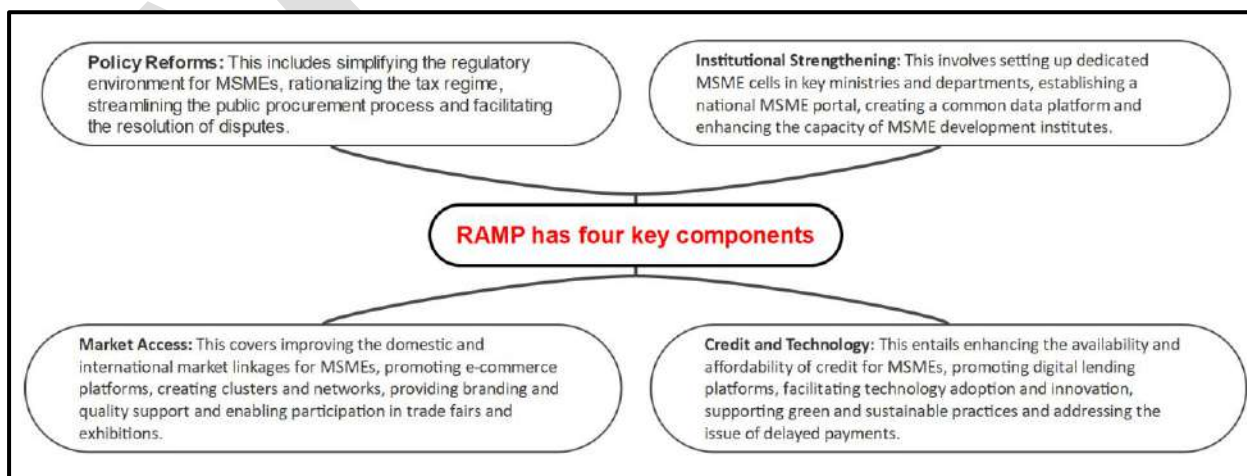
- This scheme is pioneering as it supports circular economy projects within the MSME sector. By providing credit subsidies, it encourages initiatives that promote sustainable and zero-emission practices, aligning to achieve zero emissions by 2070.

## MSE Scheme on Online Dispute Resolution for Delayed Payments

- This scheme employs a unique approach by combining legal support with modern IT tools and Artificial Intelligence. It's specifically designed to address delayed payments encountered by Micro and Small Enterprises, streamlining the resolution process through advanced technology.

## RAMP can boost the growth of MSMEs in India

- MSMEs are the backbone of the Indian economy, **contributing to 30% of GDP and 48% of exports**. However, they face many challenges such as a lack of access to finance, technology, markets and delayed payments. To address these issues, the Government of India has launched a new initiative called Raising and Accelerating MSME Performance (RAMP).

- **RAMP is a comprehensive and holistic program that aims to strengthen the institutional and policy framework for MSME development at the central and state levels**. It also seeks to improve the coordination and collaboration between the Centre and the States, as well as between various stakeholders such as banks, industry associations, technology providers and academia.



**Policy Reforms:** This includes simplifying the regulatory environment for MSMEs, rationalizing the tax regime, streamlining the public procurement process and facilitating the resolution of disputes.

**Institutional Strengthening:** This involves setting up dedicated MSME cells in key ministries and departments, establishing a national MSME portal, creating a common data platform and enhancing the capacity of MSME development institutes.

**RAMP has four key components**

**Market Access:** This covers improving the domestic and international market linkages for MSMEs, promoting e-commerce platforms, creating clusters and networks, providing branding and quality support and enabling participation in trade fairs and exhibitions.

**Credit and Technology:** This entails enhancing the availability and affordability of credit for MSMEs, promoting digital lending platforms, facilitating technology adoption and innovation, supporting green and sustainable practices and addressing the issue of delayed payments.

## Conclusion

- RAMP is expected to have a positive impact on the growth, productivity, competitiveness and employment generation of MSMEs in India. It will also help in achieving the vision of Atmanirbhar Bharat or self-reliant India.

# PPP Beginner's e-Course

## Context

- The launch of the Public-Private Partnership (PPP) Beginner's e-Course by the World Bank and the Department of Economic Affairs (DEA) signifies a significant step toward fostering collaboration between the public and private sectors in infrastructure capacity-building.

## Key Highlights

### Course Overview

- The PPP e-course is an **infrastructure-focused capacity-building program initiated by the Infrastructure Finance Secretariat, DEA, and the World Bank.** Comprising 5 modules, the course covers major elements associated with the lifecycle of PPP projects. These include the introduction to PPPs, identification of projects, structuring, tendering and implementation, and monitoring aspects of PPP projects.

### Objective

- The course **aims to equip individuals with foundational knowledge and insights to contribute effectively to PPP projects in India.** It focuses on enhancing the capacity for successful structuring and implementation of PPP projects across various infrastructure sectors.
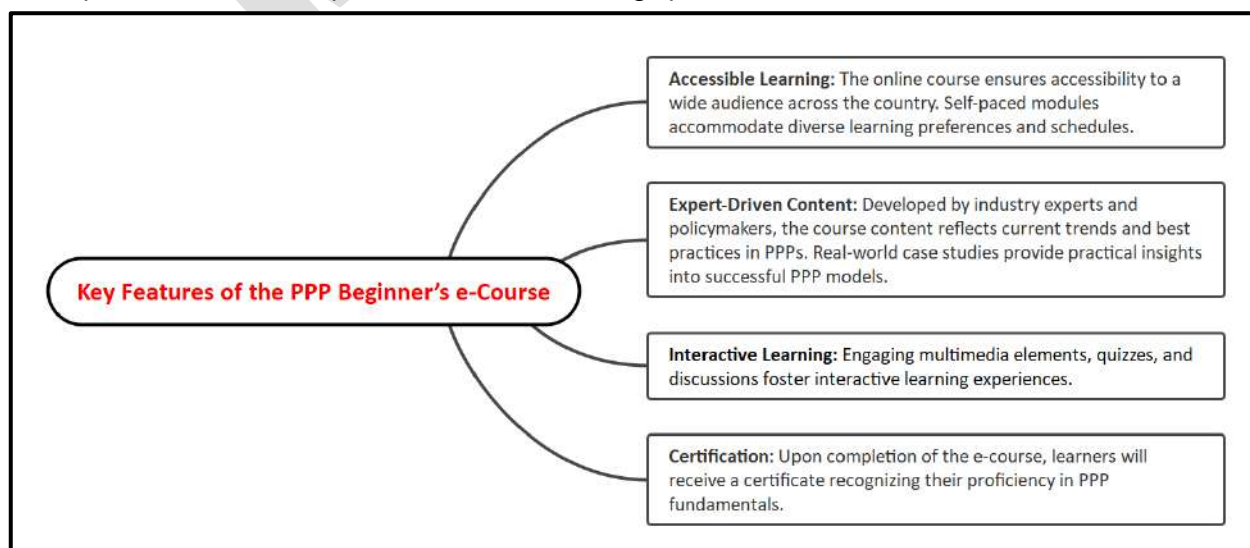
### Infrastructure as a Catalyst

- Infrastructure is highlighted as a catalyst for economic growth and a crucial focus area for the government. The collaboration between the public and private sectors is emphasized for successful infrastructure development.

### Continuous Learning

- Successful delivery of PPP infrastructure projects requires robust capacity building for effective planning, execution, and maintenance. Continuous learning and adaptation are considered crucial for addressing dynamic challenges in infrastructure development.

### Course Duration and Design

- The course has a duration of 7 hours and 15 minutes but is designed to be self-paced. No prior experience in PPP is required for individuals taking up the course.

**Key Features of the PPP Beginner's e-Course**

**Accessible Learning:** The online course ensures accessibility to a wide audience across the country. Self-paced modules accommodate diverse learning preferences and schedules.

**Expert-Driven Content:** Developed by industry experts and policymakers, the course content reflects current trends and best practices in PPPs. Real-world case studies provide practical insights into successful PPP models.

**Interactive Learning:** Engaging multimedia elements, quizzes, and discussions foster interactive learning experiences.

**Certification:** Upon completion of the e-course, learners will receive a certificate recognizing their proficiency in PPP fundamentals.

**Conclusion**

- The PPP Beginner's e-Course is accessible online, providing a flexible learning platform for individuals interested in enhancing their understanding of PPPs in India.

# India's Indebtedness Levels

**Context**

- The Union Finance Ministry recently responded to the International Monetary Fund's (IMF) scenario-based assessment, which warned of the potential for India's government debt to reach 100% of GDP by 2027-28 under adverse circumstances.

**IMF's Assessment**

- **Medium-term Consolidation Efforts:** The IMF's Directors had recommended "ambitious medium-term consolidation efforts" due to India's elevated public debt levels and contingent liability risks.
- **Scenario-Based Assessment:** The IMF presented a scenario where, under extreme conditions like a once-in-a-century event (such as the COVID-19 pandemic), India's general government debt could reach 100% of the debt-to-GDP ratio by 2027-28.

**Finance Ministry's Response**

- **Clarification of Factual Position:** The Finance Ministry emphasized that certain presumptions and interpretations about India's indebtedness levels are based on possible scenarios, which do not accurately reflect the factual position.
- **Comparison with Other Countries:** The Ministry highlighted that similar IMF reports for other countries show much higher extreme scenarios. For instance, the U.S., U.K., and China could face debt-to-GDP ratios of 160%, 140%, and 200%, respectively, under adverse shocks.
- **Relative Performance:** The Ministry shared a cross-country comparison, asserting that India's general government debt had decreased from about 88% in 2020-21 to around 81% in 2022-23. It emphasized that India has done relatively well and is still below the debt level of 2002.
- **Worst-Case Scenario:** The Ministry clarified that the IMF's assessment talks about a worst-case scenario, not a definitive outcome. It pointed out that the same report indicates the possibility of the debt-to-GDP ratio declining to below 70% under favourable circumstances.
- **Global Shocks:** The statement acknowledged that the shocks experienced by India in this century were global in nature (global financial crisis, Taper Tantrum, COVID-19, Russia-Ukraine War), affecting the global economy. Therefore, any adverse global shock is expected to impact economies universally.

**Conclusion**

- The Finance Ministry's response aims to provide context and clarification regarding the IMF's scenario-based assessment. By emphasizing the extreme nature of the scenario and comparing India's situation with other countries, the Ministry seeks to prevent misinterpretation and assure stakeholders that the mentioned debt level is a worst-case possibility, not a predetermined outcome. It also underscores India's relative fiscal performance in the global context.

> **India's current level of indebtedness**
> - The combined internal and external debt of the Indian government is estimated at ₹155.77 lakh crore (US$2.1 trillion) as of March 2023.
> - Debt-to-GDP Ratio, a key indicator of debt sustainability, currently stands at 83%, according to the International Monetary Fund (IMF). This exceeds the generally recommended safe threshold of 60%.

## Value Investing

- Value investing is a strategy of investing in stocks that are undervalued by the market, meaning that they trade at a lower price than their intrinsic value.
    - The intrinsic value of a stock is the present value of its future cash flows or the amount of money that the company can generate for its shareholders over time.
- Value investors seek to identify and buy stocks that are trading below their intrinsic value, and hold them until the market recognizes their true worth and the price rises accordingly.
- It is based on the principle that the market is not always efficient and that sometimes it can overreact to good or bad news, creating opportunities for savvy investors to profit from mispriced stocks.
- It is often contrasted with growth investing, which is a strategy of investing in stocks that have high growth potential, regardless of their current valuation.
    - Growth investors are willing to pay a premium for stocks that have strong prospects for future earnings growth, and they expect to sell them at a higher price in the future.
- Value investing and growth investing are not mutually exclusive, and some investors may combine elements of both strategies in their portfolios.

## Tax Devolution to States

- The Union Government has released an additional instalment of ₹72,961.21 crore to the states as part of tax devolution.
- States typically receive 41% of the central government's tax revenue in 14 instalments throughout the fiscal year.
- The Union government might be releasing extra funds to:
    - Support states in meeting year-end expenditures.
    - Boost economic activity in various states.
    - Facilitate timely completion of development projects
- Implications:
    - The additional funds will provide states with more fiscal space to undertake various welfare and development programs.
    - Increased spending by states could contribute to economic growth and job creation.
    - States may be able to allocate more resources to key sectors like healthcare, education, and infrastructure, potentially enhancing service delivery to citizens.

## Fiscal Deficit

- The fiscal deficit is lower than expected, reaching 45% of the full-year target at the end of October. This is slightly better than the 45.6% reached at the same point in 2022-23.
- The fiscal deficit refers to the difference between a government's total revenue and its total expenditure in a fiscal year.
- It's a measure used to assess the financial health of a country and indicates how much the government needs to borrow to meet its expenditure.
- If the government spends more money than it earns in revenue (from taxes, etc.), it incurs a fiscal deficit. This deficit is often covered by borrowing funds, which can lead to an increase in the national debt.
- Managing the fiscal deficit is crucial for economic stability, as high deficits can strain a country's finances, leading to inflation, increased borrowing costs, and other economic challenges.

## Chit Funds

- A chit fund is a type of investment scheme in which a group of people agree to contribute a fixed amount of money periodically and take turns to receive the entire sum.
- Chit funds are a popular option for saving and borrowing money in India, especially among the low-income groups. However, chit funds are also prone to fraud and mismanagement, and hence they need to be regulated by the law.
- Chit funds in India are governed by the Chit Funds Act 1982, which makes registration of chit funds mandatory and prescribes various rules and procedures for their operation. The Act also empowers the state governments to grant sanctions and appoint registrars for chit-fund businesses.

## Social Stock Exchange

- SGBS Unnati Foundation (SUF) became the first entity to list on the NSE Social Stock Exchange.
- SUF is a not-for-profit organization (NPO) that was incorporated in 2011 and has trained over 45,000 youth.
- The Social Stock Exchange is regulated by the Securities and Exchange Board of India (SEBI).
- A social stock exchange is a platform that allows investors to buy and sell shares of companies that have a positive social or environmental impact.
- Unlike traditional stock exchanges, social stock exchanges evaluate the performance of companies not only based on their financial returns but also on their social and environmental outcomes.
- By providing access to capital and visibility to these companies, social stock exchanges aim to foster a more sustainable and inclusive economy.

## Paat-Mitro Application for Jute Farmers

- "Paat-Mitro" offers the latest practices in agronomy, empowering jute farmers with valuable cultivation techniques. Farmers can access Minimum Support Prices (MSP) information for their crops, aiding in fair pricing and decision-making.
- The app covers various aspects crucial for jute farmers, such as Jute Gradation Parameters, specific farmer-centric schemes like 'Jute-ICARE,' weather forecasts, JCI's Purchase Centers' locations, and details about Procurement Policies.
- Farmers selling raw jute to JCI under MSP Operation can track their payment status through the app, ensuring transparency and ease of transactions.
- The inclusion of a Chatbot enhances user experience, allowing farmers to get immediate answers to their queries within the app.

## Viability Gap Funding

- The Government has sanctioned a scheme to provide Viability Gap Funding (VGF) for Battery Energy Storage Systems (BESS) with a total capacity of 4,000 megawatt hours (MWh). It aims to promote the development of BESS in India and enhance the integration of renewable energy sources.
- Viability Gap Funding (VGF) is a scheme that provides grants to infrastructure projects that are economically justified but not financially viable. It aims to attract private sector participation in public-private partnerships (PPPs) by bridging the gap between the project cost and the expected revenue.

## Jamun tree

- Researchers in India have achieved a significant breakthrough by sequencing the complete genome of the jamun tree, the largest genome sequenced from its genus.
- The jamun genome has a higher number of genes compared to other species in its genus, suggesting a past event of gene duplication. This duplication could potentially give jamun unique functions and adaptations.
- The research identified genes involved in producing various beneficial metabolites in jamun, including terpenoids (defence, antioxidant, and anti-inflammatory) and alkaloids (curative properties).
- The genome analysis also revealed genes associated with stress tolerance in jamun, making it resistant to factors like weeds, insects, heat, salinity, and drought.
- The combination of various bioactive compounds in jamun, including flavonoids and alkaloids, suggests its potential for treating various diseases and its use as nutraceuticals in modern medicine.
- Evergreen tropical tree with valuable fruits, wood, and medicinal properties. Native to India and Southeast Asia, but cultivated worldwide.

## Lakadong Turmeric

- The Geographical Indication (GI) tag awarded to Lakadong turmeric ensures official recognition and protection for the distinctive qualities of turmeric grown in the Lakadong area of Jaintia Hills, Meghalaya.
- It is renowned for its exceptionally high curcumin content. Curcumin is the active compound in turmeric that is believed to have various health benefits, including anti-inflammatory and antioxidant properties.
- It is characterized by its deep orange-yellow colour, which is indicative of its high curcumin content. This colour is often associated with the quality and potency of turmeric.
- It is known for its strong and aromatic fragrance. This aromatic quality is another indicator of its purity and potency.

## Bharat New Car Assessment Programme

- The Bharat New Car Assessment Programme (Bharat NCAP) has completed its initial round of crash tests, involving entry-level variants of cars from manufacturers like Maruti Suzuki India, Tata Motors, and Kia India.
- Bharat NCAP is a voluntary initiative that applies to vehicles falling under the M1 category (gross weight ≤ 3,500kg) used for passenger carriage.
- The assessment evaluates adult occupant protection, child occupant protection, and safety assist technologies.
- Each car undergoes tests in its base variant, assessing safety aspects across multiple crash scenarios. This includes frontal impact tests at varying speeds.
- Cars are rated from zero to five stars based on their performance in the safety tests, indicating their safety levels.

## 3.18    1 MAINS & 5 MCQs

**Q1. *What role do Primary Agricultural Credit Societies (PACS) play in the rural agricultural economy, and how do they contribute to the financial well-being of farmers? What are some key challenges faced by PACS in promoting agricultural credit and rural development?***

**Answer:**

- Primary Agricultural Credit Societies (PACS) are the most basic and grassroots-level institutions in the cooperative credit structure of India. They provide credit and other financial services to the rural agricultural sector, especially the small and marginal farmers, who often lack access to formal banking channels. PACS also play a vital role in promoting rural development by supporting various activities such as crop production, marketing, processing, storage, distribution, and allied sectors.
- PACS has been instrumental in enhancing the financial well-being of farmers by providing them with timely and adequate credit at reasonable interest rates, as well as facilitating savings and insurance services. PACS also help farmers to access inputs, technology, information, and markets, thereby improving their productivity and income. Moreover, PACS foster a sense of collective responsibility and mutual trust among the rural communities, which strengthens their social capital and empowerment.
- However, PACS also face several challenges in fulfilling their objectives and potential. Some of the key challenges are:
  o Lack of adequate capital and resources: PACS often suffer from low capital base, high dependence on external borrowings, poor recovery performance, and high operational costs. These factors limit their ability to lend to more farmers and expand their portfolio of services.
  o Lack of professionalism and governance: PACS often lack trained and qualified staff, proper accounting and auditing systems, transparent and democratic decision-making processes, and effective monitoring and supervision mechanisms. These factors affect their operational efficiency, accountability, and credibility.
  o Lack of diversification and innovation: PACS often have a narrow focus on crop

loans and do not offer a wide range of products and services to meet the diverse and changing needs of the rural agricultural sector. They also lag in adopting new technologies and innovations that can improve their service delivery and outreach.

- o Lack of integration and coordination: PACS often operate in isolation and do not have strong linkages with other institutions in the cooperative credit structure, such as District Central Cooperative Banks (DCCBs) and State Cooperative Banks (SCBs). They also face competition from other players in the rural financial market, such as commercial banks, microfinance institutions, self-help groups, etc.

- These challenges require urgent attention and action from various stakeholders, such as the government, the Reserve Bank of India (RBI), the National Bank for Agriculture and Rural Development (NABARD), the cooperative federations, the PACS themselves, and the farmers. Some possible measures to address these challenges are:

- o Strengthening the capital base and resource mobilization of PACS: This can be done by increasing the share capital contribution from members, enhancing the internal generation of funds, improving the recovery performance, reducing the operational costs, accessing external sources of funds from higher-level institutions or other agencies, etc.

- o Improving the professionalism and governance of PACS: This can be done by providing training and capacity building to staff and management committee members, adopting standard accounting and auditing practices, ensuring transparency and participation in decision-making processes, establishing effective monitoring and supervision mechanisms, etc.

- o Diversifying and innovating the products and services of PACS: This can be done by offering a variety of loans for different purposes (such as consumption, education, health, housing, etc.), introducing non-credit services (such as savings, insurance, remittance, etc.), adopting digital technologies (such as mobile banking, biometric authentication, etc.), developing value-added services (such as input supply, output marketing, processing, storage, etc.), etc.

- o Integrating and coordinating PACS with other institutions: This can be done by strengthening the linkages between PACS and higher-level institutions in the cooperative credit structure (such as DCCBs and SCBs), forming networks or federations among PACS for sharing resources and best practices, collaborating with other players in the rural financial market (such as commercial banks, microfinance institutions, self-help groups, etc.), etc.

- By addressing these challenges effectively, PACS can play a more significant role in the rural agricultural economy and contribute to the financial well-being of farmers. They can also become more sustainable and competitive institutions that can serve as models for cooperative development in India.

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**Q2. What is the objective of the RAMP initiative launched by the Indian Government?**

A) To promote large-scale corporations
B) To facilitate international trade agreements
C) To improve the competitiveness and growth of MSMEs
D) To establish government-owned enterprises

**Q3. The "Paat-Mitro" mobile application recently gained attention due to its association with:**

A) Weather forecasting services
B) Digital marketing for agricultural products
C) Jute cultivation information and MSP details
D) Livestock healthcare updates

**Q4. Which of the following countries are the**

*members of the European Free Trade Association (EFTA):*

1. Iceland
2. Liechtenstein
3. Norway
4. Switzerland
5. Ireland
6. Denmark

**How many of the above codes are correct?**

A) Only three
B) Only four
C) Only five
D) All six

*Q5. Which institution has released the Migration and Development Briefs?*

A) United Nations Educational, Scientific, and Cultural Organization (UNESCO)
B) International Monetary Fund (IMF)
C) World Bank
D) World Health Organization (WHO)

*Q6. Which international organization releases the "State of Food and Agriculture" report?*

A) World Health Organization (WHO)
B) United Nations Educational, Scientific and Cultural Organization (UNESCO)
C) Food and Agriculture Organization (FAO)
D) International Monetary Fund (IMF)

**ANSWERS: 1) C, 2) C, 3) B, 4) C, 5) C**

# 4. DEFENSE & SECURITY

## 4.1    INDIA-GERMANY MILITARY COOPERATION

### Context

- The 16th India-Germany Military Cooperation Sub Group (MCSG) meeting held in New Delhi on December 5-6, 2023, focused on strengthening bilateral defence collaboration, emphasizing strategic partnerships, and fostering technological exchanges between the two nations.

### Key Discussion Points

- The primary focus revolved around **exploring fresh avenues for cooperation within the existing defence frameworks**. This signifies intent to broaden and diversify their partnership beyond established boundaries.
- **Consolidating current defence collaborations was another key agenda**. This underlines a commitment to sustain and further develop joint projects and programs, emphasizing continuity and growth in their relationship.

> **India and Germany Relation**
> - **Since 2001, India and Germany have enjoyed a "Strategic Partnership,"** emphasizing cooperation in areas like security, counter-terrorism, and regional stability.
> - Both countries collaborate in international forums like the G4 for UN Security Council reform and G20, showcasing shared interests on global issues.
> - **Germany is India's largest trading partner in Europe and 5th largest overall,** with bilateral trade exceeding $20 billion annually.
> - **Germany is a major source of foreign direct investment (FDI) in India**, contributing to infrastructure development and job creation.
> - India and Germany share a **strong partnership in technology transfer and knowledge sharing, particularly in areas like renewable energy and advanced manufacturing.**

> **Germany**
> - Germany borders nine countries: Denmark, Poland, the Czech Republic, Austria, Switzerland, France, Luxembourg, Belgium, and the Netherlands.
> - Its central location and access to major waterways like the Rhine River have historically made it a significant trade hub.
> - Germany boasts the largest national economy in Europe, and the third-largest by nominal GDP in the world. This translates to a significant role in the global economy.
> - Renowned for its strong manufacturing sector, Germany is a leader in industries like automobiles, machinery, chemicals, and pharmaceuticals.
> - Germany is a major exporter of goods and services, with its high-quality products and efficient logistics system reaching markets worldwide.

## About Military Cooperation Sub Group (MCSG)

- The MCSG operates as a dedicated platform **facilitating regular dialogues between the Indian and German military establishments.**
- Its scope spans strategic and operational levels, ensuring comprehensive collaboration across diverse defence facets.
- It functions under the broader ambit of the Headquarters, Integrated Defence Staff (India) and the Department of International Cooperation Armed Forces (Germany).

## Potential Areas of Collaboration

- **Joint Military Exercises and Training:** Sharing expertise and conducting joint exercises can augment the military capabilities of both nations.
- **Technology Transfer and Co-Production:** Collaborating on developing and producing defence technologies promises strategic and economic benefits for both India and Germany.
- **Maritime Security and Counter-Terrorism:** Cooperation in these areas contributes to regional stability and addresses shared security concerns.
- **Cybersecurity and Information Sharing:** Joint efforts to combat cyber threats and improve information exchange strengthen national security measures.

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**India and Germany Military Cooperation**

- India-Germany High Defence Committee (HDC) established in 2006, this committee meets annually to discuss strategic defence cooperation, exchange information on security threats, and explore joint initiatives.
- Military personnel from both countries participate in exchange programs to enhance understanding of each other's doctrines and operational procedures.
- India and Germany have conducted various exercises, including the MILEX series, focusing on maritime security, counter-terrorism, and humanitarian assistance.
- India and Germany explore joint development and production of military equipment, leveraging Germany's technological prowess and India's growing manufacturing capabilities.
- German defence companies provide training and technical assistance to Indian partners, advancing India's indigenous defence production capabilities.
- Sharing best practices and expertise in cyber defence to address evolving threats. Working together in UN peacekeeping missions and disaster relief operations.
- Collaborating on maritime domain awareness, counter-piracy initiatives, and joint patrols in the Indian Ocean.

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## Conclusion

- The 16th MCSG meeting underscores the escalating strategic partnership between India and Germany in defence matters. By focusing on new initiatives and reinforcing existing collaborations, both nations display a robust commitment to deepening their military relationship. This not only enhances their military capabilities but also contributes to regional and global security.

## 4.2 ANTI-MONEY LAUNDERING DIALOGUE

### Context

- The India-U.S. Anti-Money Laundering and Countering the Financing of Terrorism (AML/CFT) Dialogue held in New Delhi showcased the joint commitment of India and the United States to collaborate on mitigating illicit financial risks within the global financial system.

### The dialogue emphasized two crucial goals:

- Both nations reaffirmed their commitment to **working together to tackle illicit financial risks**. This involves a collective effort to combat issues like sanctions evasion and terrorist financing, not just within their respective regions but also on a global scale.
- The dialogue emphasized the **need for improved cooperation and information sharing between India and the U.S**. This collaboration aims to strengthen strategies against illicit financial activities, enabling better enforcement and preventive measures.

### Money laundering

- It is the **illegal process of making large amounts of money generated by criminal activity, such as terrorist funding or drug trafficking;** appear to have come from a legitimate source. It is considered dirty money and the launderers try to make such transactions look genuine and clean.
- It is a **serious threat to the economic and social stability of a country,** as it undermines the integrity of the financial system, distorts the market, erodes the tax base, facilitates corruption and crime, and fuels terrorism.
- Money laundering works by moving funds through a complex and often international network of intermediaries, such as banks, shell companies, offshore accounts, hawala dealers, etc.

### Impact of Money Laundering on India

- According to some estimates, India loses about $50 billion annually due to money laundering. Some of the adverse **effects of money laundering on India are:**
  - It undermines the legitimacy of the private sector and creates unfair competition for honest businesses.
  - It erodes the integrity of the financial markets and increases the risk of financial instability and contagion.
  - It reduces the effectiveness of monetary and fiscal policies and hampers economic development and growth.
  - It deprives the government of tax revenue and reduces public spending on social welfare and infrastructure.
  - It facilitates corruption and crime and undermines the rule of law and democratic institutions.
  - It poses security threats to national sovereignty and territorial integrity by enabling terrorist financing and cross-border crimes.

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**Steps taken to combat Money laundering**

**The Income Tax Act, 1961,** imposes tax on income from any source and provides for disclosure of foreign assets and income.

**The Benami Transactions (Prohibition) Act, 1988,** prohibits holding property in another person's name without a valid reason and provides for confiscation of such property.

**The Foreign Exchange Management Act (FEMA), 1999,** regulates cross-border transactions and imposes penalties for violations of foreign exchange rules.

**The Prevention of Money Laundering Act (PMLA), 2002,** defines money laundering as a criminal offence and provides for confiscation of property derived from or involved in money laundering.

**The Black Money (Undisclosed Foreign Income and Assets) and Imposition of Tax Act, 2015,** imposes tax on undisclosed foreign income and assets and provides for prosecution for non-disclosure.

**The Fugitive Economic Offenders Act, 2018,** empowers the authorities to declare a person as a fugitive economic offender if he or she has left India to avoid prosecution for certain economic offences involving more than Rs 100 crore.

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## Challenges in effectively curbing money laundering

- **Lack of adequate resources and capacity of the enforcement agencies** to detect, investigate and prosecute money laundering cases.
- **Lack of coordination and cooperation** among various agencies involved in anti-money laundering efforts at domestic and international levels.
- **Lack of awareness and compliance** among financial institutions and intermediaries regarding their obligations to report suspicious transactions and maintain records.
- **Lack of transparency and accountability** in the political and corporate sectors regarding their sources and uses of funds.
- **Lack of effective implementation and enforcement** of existing laws and regulations due to loopholes, delays, corruption and judicial backlog.

## Way forward to tackle Money laundering

- **Strengthening the institutional framework and capacity** of the anti-money laundering agencies by providing them with adequate resources, training, technology and autonomy.
- **Enhancing the inter-agency coordination and cooperation** at the domestic level by establishing a centralized agency or mechanism for information sharing and analysis.
- **Improving international cooperation and collaboration** with other countries and multilateral bodies by signing bilateral agreements, joining global initiatives, and complying with international standards and norms.
- **Increasing awareness and compliance** among financial institutions and intermediaries by conducting regular audits, inspections, education campaigns, and imposing sanctions for non-compliance.
- **Promoting transparency and accountability** in the political and corporate sectors by enforcing disclosure norms, implementing electoral reforms, curbing illicit political funding, and cracking down on shell companies.
- **Streamlining the legal process and ensuring speedy justice by simplifying procedures**, reducing pendency, enhancing judicial capacity, and imposing deterrent penalties.

## Conclusion

- Money laundering is a complex and dynamic phenomenon that poses a grave threat to the economic and social fabric of India. It requires a concerted and coordinated effort from all stakeholders to prevent, detect and deter it. India has made some progress in this regard, but there is still a long way to go to achieve a clean and resilient financial system.

## 4.3 MARITIME SECURITY

## Context

- The Indian Prime Minister discusses the heightened security threat to maritime vessels in the Gulf of Aden and the Arabian Sea with Saudi Arabia's Prime Minister.

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- The Gulf of Aden is a deepwater gulf of the Indian Ocean, situated between Yemen on the north, Djibouti on the west, and Somalia to the south.
- It's a vital waterway for shipping, especially for Persian Gulf oil, making it an integral part of the world economy.
- Approximately 11% of the world's seaborne petroleum passes through the Gulf of Aden on its way to the Suez Canal or regional refineries.
- Main ports: Aden, Balhaf, Bir Ali, Mukalla, and Shokra (Yemen); Djibouti City (Djibouti); Zeila, Berbera, Maydh, and Las Khorey (Somali land); Bosaso (Somalia).

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## Indian Maritime Security

- India is a country with a **long coastline of over 7,000 km, 1,200 islands, and a large exclusive economic zone (EEZ) of about 2 million km$^2$.**
- India's maritime security involves protecting its sovereignty, interests, and assets from threats arising from the oceans and seas. These threats include piracy, terrorism, smuggling, illegal fishing, environmental degradation, natural disasters, and geopolitical rivalries.

### India's Maritime Security Policy

- India's maritime security policy is **guided by its national vision of becoming a leading power that can contribute to global peace and prosperity.** India's maritime security policy is based on the following features:

  o A comprehensive approach that **covers all aspects of maritime security such as defence, diplomacy, development, disaster management, environment, law enforcement, and capacity building.**

  o A cooperative approach that seeks to **engage with other countries and regional and international organizations** to address common challenges and opportunities in the maritime domain.

India's maritime security is important for several reasons

India depends on the sea for its trade, energy, and food security. **About 90% of India's trade by volume and 70% by value is carried by sea.** India imports about 80% of its oil and gas needs from overseas sources, mostly through the Indian Ocean. India also has a large fishing industry that employs millions of people and contributes to its food security.

India has a strategic interest in **maintaining peace and stability in the Indian Ocean Region (IOR), which is home to about one-third of the world's population and accounts for about half of the world's container traffic and two-thirds of the world's oil shipments.** The IOR is also a region of growing competition and cooperation among major powers such as China, the US, Japan, Australia, France, and Russia. **India seeks to play a leading role in shaping the regional order and promoting a rules-based maritime order.**

India has a **responsibility to safeguard its maritime heritage and culture, which dates back to ancient times.** India has a rich maritime history of trade, exploration, and diplomacy with various civilizations across Asia, Africa, and Europe. **India also has a diverse maritime ecosystem that includes coral reefs, mangroves, wetlands, marine parks, and sanctuaries.**

  o A **balanced approach that maintains a credible naval deterrent while avoiding unnecessary confrontation** or provocation with other maritime actors.

  o A proactive approach that anticipates emerging threats and opportunities and takes timely and effective actions to protect and advance India's interests.

  o A sustainable approach that ensures the conservation and management of marine resources and the protection of the marine environment.

## Steps Taken to enhance Maritime Security

**At the Operational level**

India has **developed a strong naval force** that comprises aircraft carriers, submarines, destroyers, frigates, corvettes, patrol vessels, amphibious ships, landing craft, auxiliary vessels, helicopters, and aircraft.

India has **modernized its naval infrastructure** such as ports, bases, shipyards, and dockyards. India has also enhanced its maritime surveillance and intelligence capabilities through satellites, radars, and unmanned aerial vehicles (UAVs).

**At the Diplomatic level**

India has **pursued a proactive maritime diplomacy** that involves bilateral, trilateral, and multilateral engagements with other countries and organizations on maritime issues.

India has **signed several agreements and memoranda of understanding (MoUs) on maritime cooperation** with countries such as the US, Japan, Australia, France, Russia, Indonesia, Malaysia, Singapore, Sri Lanka, Maldives, Seychelles, Mauritius, etc.

India has **participated in various regional and international forums and initiatives on maritime security** such as the Indian Ocean Rim Association (IORA), the Indian Ocean Naval Symposium (IONS), the Indian Ocean Commission (IOC), the Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation (BIMSTEC), the Association of Southeast Asian Nations (ASEAN) Regional Forum (ARF), the ASEAN Defence Ministers' Meeting Plus (ADMM+), the East Asia Summit (EAS), the Quad, the Malabar exercise, the Milan exercise, the RIMPAC exercise, etc.

**At the National level**

India has established a **robust institutional framework for coordinating maritime security among various stakeholders** such as the National Security Council (NSC), the National Committee for Maritime Security (NCMS), the National Maritime Authority (NMA), and the National Maritime Board (NMB).

India has **enacted several laws and regulations to govern its maritime activities** such as the Maritime Zones of India Act (1976), the Territorial Waters Act (1976), the Continental Shelf Act (1976), the Exclusive Economic Zone Act (1981), the Coast Guard Act (1978), the Merchant Shipping Act (1958), etc.

**At the Developmental level**

India has launched several projects and programs to enhance its maritime capabilities and capacities. Some of these are:-
1. **Sagarmala project** aims to develop India's coastal and port infrastructure, connect India's islands and remote areas with the mainland.
2. **Project Mausam** aims to revive India's ancient maritime links and cultural heritage.
3. **Project Samudra Shakti** aims to empower India's coastal communities and fishermen; etc.

## Challenges Faced in Ensuring Maritime Security

### Rise of China and Strategic Developments

- **Belt and Road Initiative (BRI):** China's ambitious BRI aims to enhance its connectivity and influence globally, including in the Indian Ocean Region (IOR). This can lead to geopolitical tensions and competition for strategic dominance.
- **Naval Modernization:** China's significant investments in naval modernization, including the development of aircraft carriers, pose a challenge to India's maritime security.

### Non-Traditional Threats

- **Piracy:** Maritime piracy remains a persistent threat, particularly in the Gulf of Aden and parts of the Indian Ocean, affecting shipping lanes and maritime trade.
- **Terrorism:** The maritime domain can be exploited by terrorist organizations for activities such as smuggling weapons, conducting attacks, and facilitating illicit funding.
- **Illegal Activities:** Smuggling, illegal fishing, human trafficking, drug trafficking, and arms trafficking pose serious risks to India's maritime security and economic interests.

### Resource and Capability Constraints

- **Manpower:** Insufficient personnel for effective monitoring and patrolling of India's vast maritime borders.
- **Equipment and Technology:** Limited access to advanced maritime surveillance technologies and equipment.
- **Funding:** Inadequate financial resources to support the necessary infrastructure and capabilities for comprehensive maritime security.
- **Coordination:** Challenges in coordinating efforts among various maritime agencies and departments.

### Gap Between Aspirations and Achievements

- **Bureaucratic Hurdles:** Bureaucratic red tape and procedural delays can hinder the timely

implementation of maritime security initiatives.
- **Political Indecision:** Inconsistent or delayed policy decisions can impact the effective response to emerging maritime challenges.
- **Operational Inefficiency:** Inefficiencies in operational planning and execution can compromise the effectiveness of maritime security measures.

## Way Forward to Enhance Maritime Security
- **National Maritime Security Strategy:** Creating a detailed strategy is crucial. It should encompass a long-term vision, outlining objectives, threats, opportunities, and priorities. This strategy should serve as a roadmap for all stakeholders involved in maritime security.
- **Strengthening Institutional Framework:** Elevating the National Maritime Authority (NMA) to a more authoritative role for comprehensive coordination among various agencies involved in maritime security is essential. This will ensure efficient cooperation and collaboration.
- **Naval Capabilities Upgrade:** Enhancing naval force structures with modern platforms, technology, and indigenous development is vital. This includes advancements in shipbuilding, missile development, and other key areas to bolster capabilities for regional power projection and deterrence.
- **Expansion of Maritime Diplomacy:** Strengthening partnerships with other countries and international bodies focused on maritime issues is crucial. Active participation in shaping norms and institutions will further India's influence in the global maritime domain.
- **Promotion of Maritime Development:** Initiatives aimed at improving coastal and port infrastructure, facilitating trade, ensuring energy security, and sustainably managing ocean resources are key. Involving private sectors and civil society in these endeavours can amplify their impact.
- **Enhancing Maritime Awareness and Culture:** Public engagement through education, research, training, media coverage, and outreach programs will raise awareness about maritime issues among citizens. Celebratory events can help highlight India's rich maritime heritage and achievements.

## Conclusion
- India is a country with a strong maritime tradition and potential. India's maritime security is vital for its national development and regional stability. India has taken several steps to enhance its maritime security at different levels. However, India also faces several challenges that require a holistic and integrated approach to address them effectively. India needs to formulate a national maritime security strategy that can provide a clear direction and guidance for all stakeholders involved in maritime security.

## 4.4 COLOMBO SECURITY CONCLAVE

### Context
- The Colombo Security Conclave (CSC) has emerged as a critical platform fostering security collaboration among Indian Ocean nations.

### Colombo Security Conclave (CSC)
- The Colombo Security Conclave (CSC) is a **regional security grouping that aims to enhance and strengthen cooperation among the Indian Ocean littoral states on various aspects of maritime security.**
- The CSC was formed in 2011 as a trilateral initiative of **India, Sri Lanka and the Maldives, and has since expanded to include Mauritius as the fourth member, with Bangladesh and Seychelles as observers.**

- The CSC is based on the recognition that the Indian Ocean is a vital lifeline for global trade and commerce and that the security challenges in the region require collective and collaborative responses.

## Significance of the CSC

### Counter-Terrorism (CT) and Radicalization

- The CSC recognizes that terrorism and radicalization pose serious threats to the peace and stability of the region.
- It aims to prevent and counter these threats by exchanging intelligence, best practices and lessons learned among its members.
- It seeks to enhance cooperation on legal aspects, capacity building and de-radicalization programs.

### Combating Trafficking and Transnational Organized Crime (TOC)

- The CSC acknowledges that trafficking and TOC are major challenges that undermine the rule of law and human security in the region.
- It aims to combat these challenges by strengthening coordination among law enforcement agencies, enhancing border management and security, facilitating mutual legal assistance and extradition, and promoting awareness campaigns.

### Cyber Security and Protection of Critical Infrastructure and Technology

- The CSC realizes that cyber security is an essential component of maritime security in the digital age.
- It aims to improve cyber security by sharing information on cyber threats and incidents, developing common standards and protocols, conducting joint training and exercises, and protecting critical infrastructure and technology from cyber-attacks.

### Humanitarian Assistance and Disaster Relief (HADR)

- The CSC acknowledges that natural disasters are frequent occurrences in the region that require timely and effective response.
- It aims to provide HADR by sharing information on disaster situations, mobilizing resources and assets, conducting joint relief operations, providing medical assistance and evacuation, and supporting reconstruction efforts.

## Challenges faced by the CSC

- **Divergent interests and priorities among its members** on some maritime security issues, such as maritime boundary disputes, fishing rights, port development and naval presence.
- **Lack of trust and transparency among some of its members** due to historical grievances, political differences and external influences.
- **Limited resources and capabilities of some of its members** to effectively address the maritime security challenges in the region.
- **Lack of institutionalization and regularity of the CSC meetings and mechanisms** may affect the continuity and momentum of cooperation.
- **Competition and rivalry from other regional and extra-regional actors** in the Indian Ocean, who may have different agendas and interests on maritime security issues.

## Way forward for the CSC

- The CSC has a lot of potential to become a successful regional maritime security initiative that can benefit its members and the region. To realize this potential, the CSC needs to overcome its challenges and take some measures to enhance its cooperation. Some of these measures are:
  - o **Harmonizing the interests and priorities of its members** on maritime security issues through dialogue and consultation.
  - o **Building trust and transparency among its members** by increasing interactions and exchanges at various levels.
  - o Augmenting the resources and capabilities of its members by leveraging their respective strengths and complementarities.
  - o **Institutionalizing and regularizing the CSC meetings and mechanisms** by establishing a permanent secretariat, a dedicated fund and a common agenda.
  - o **Engaging with other regional and extra-regional actors in the Indian Ocean** by inviting them as observers or partners, depending on their relevance and contribution to maritime security issues.

## Conclusion

- The Colombo Security Conclave (CSC) is a promising and pragmatic initiative that can contribute to the creation of a secure, stable and prosperous Indian Ocean region. It can serve as a model for other regions or sub-regions to emulate or adapt. It has the potential to become a key pillar of India's maritime security strategy and a catalyst for regional integration and cooperation.

## 4.5 SHORT ARTICLES

# Defence Acquisition Council

### Context

- The Defense Acquisition Council (DAC) approves the acquisition of an indigenously developed aircraft for the armed forces.

### About Defence Acquisition Council (DAC)

- It is a crucial decision-making body **within the Ministry of Defence**.
- It was **established in 2001 following recommendations after the Kargil War in 1999**. These recommendations aimed at reforming the national security system and enhancing defence preparedness.
- The council is **chaired by the Minister of Defence**, who leads discussions, deliberations, and decision-making processes related to defence acquisitions and policies.
- It consists of senior officials from the Ministry of Defence, the Armed Forces, and other relevant stakeholders involved in defence acquisition and policymaking.

### Role and Functions

- It serves as the **highest authority responsible for approving and guiding the acquisition** of new defence equipment, technologies, and systems for the armed forces.
- It **approves procurement proposals**, including defence platforms, weapons, technology upgrades, and major defence systems.
- It plays a vital role in **formulating defence acquisition policies**, strategies, and frameworks aimed at enhancing India's defence capabilities and modernizing its armed forces.

### Recent Approvals

- Initial approval for the procurement of 97 Tejas light combat aircraft, promoting indigenous defence manufacturing.
- Approval for acquiring 156 Prachand combat helicopters.
- **98% of total procurement from domestic industries, aligning with India's 'aatmanirbharta' (self-reliance) in defence manufacturing.**

- Approval for the Indian Air Force's Su-30 fighter fleet upgrade by Hindustan Aeronautics Ltd. (HAL).

- Procurement approval for two types of anti-tank munitions: Area Denial Munition (ADM) Type-2 and -3.

- Acquisition and integration approval for automatic target tracker (ATT) and digital basaltic computer (DBC) for T-90 tanks.

- Procurement approval for medium-range anti-ship missiles (MRAShM) for the Navy.

**Conclusion**

- The Defence Acquisition Council is a vital body that plays a critical role in shaping India's defence landscape. Its decisions balance strategic needs, budgetary considerations, and domestic aspirations, aiming to ensure a well-equipped and self-reliant armed force.

## 4.6    SNIPPETS

### Pilatus PC-7 Mk II

- The Pilatus PC-7 Mk II is a Swiss-made turboprop trainer aircraft used by the Indian Air Force (IAF) to train its pilots.

- It is a low-wing, tandem-seat aircraft, with the cadet pilot sitting in the front and the instructor behind.

- The original PC-7 entered service in the 1970s, but the Mk II version introduced in the 1990s features a newer airframe and more advanced avionics.

- It is powered by a Pratt & Whitney Canada PT6A-25C turboprop engine, giving it a maximum speed of 412 kilometres per hour (256 mph) and a service ceiling of over 10,000 meters (32,800 ft).

- The aircraft has a range of 1,200 kilometres (746 mi) without external fuel tanks, which translates to slightly more than 4 hours of flying time.

### Exercise VINBAX

- The 4th edition of the Joint Military Exercise VINBAX, held from December 11th to 21st, 2023, in Hanoi, Vietnam.

- This annual exercise, alternating between the two countries, fosters collaboration, interoperability, and knowledge sharing in peacekeeping operations.

- It strengthens the understanding and interoperability between the Indian and Vietnamese forces. It promotes knowledge sharing and exchange of best practices in peacekeeping operations.

- The exercise contributes to regional stability and preparedness for potential peacekeeping missions.

- VINBAX was initiated in 2018, with the first edition held in Jabalpur, India. The previous exercise was conducted at Chandimandir Military Station in India in August 2022.

## SAMAR Air Defence Missile System

- The Indian Air Force successfully test-fires its SAMAR air defence missile system.
- The system, created using refurbished Russian-origin air-to-air missile systems, is a short-range, quick-reaction surface-to-air missile system.
- It involves a twin-turret launch platform that can launch two missiles in single or salvo mode.
- It operates at a speed range of 2 to 2.5 Mach with a 12-kilometre engagement range.
- It is designed to engage low-flying aerial threats, including fighter planes, helicopters, and unmanned aerial vehicles (UAVs).

## Solid-Fuel Missiles

- North Korea's recent test-firing of a solid-fuel intercontinental ballistic missile (ICBM) has raised alarms in the international community.
- Unlike liquid-fuel missiles, which require lengthy fueling processes, solid-fuel missiles can be stored and launched quickly, maximizing surprise and minimizing vulnerability.
- Solid fuel is less prone to leaks and corrosion, demanding less maintenance and upkeep compared to liquid fuels. Their compact and stable nature makes them easier to transport and deploy, increasing deployment flexibility.
- Solid-fuel missiles operate through the rapid combustion of a special mixture called solid propellant. This mixture typically comprises Fuel, Oxidizer, and Binding Agent.

## Flying Wing Technology Demonstrator

- Defence Research and Development Organisation (DRDO) conducted a successful flight trial of the Autonomous Flying Wing Technology Demonstrator in Karnataka's Chitradurga.
- It is an indigenous high-speed flying-wing Unmanned Aerial Vehicle (UAV) developed by DRDO's Aeronautical Development Establishment.
- The aircraft prototype features a complex arrowhead wing platform made of lightweight carbon prepreg composite material developed within the country.
- This high-speed UAV can autonomously land without relying on ground radars, infrastructure, or a pilot, enabling take-off and landing from any surveyed runway coordinates.

## Indian Ocean Naval Symposium (IONS)

- The Royal Thai Navy hosted the 8th IONS Conclave in Bangkok, December 19-22, 2023.
- Thailand assumed the IONS Chair for two years, India's flag became official, and India co-chaired key working groups on Maritime Security and Humanitarian Assistance and Disaster Relief (HADR).
- The Republic of Korea Navy joined as an 'Observer,' increasing IONS' strength to 34 nations.
- India to host the 9th IONS Conclave in 2025, taking Chairmanship from 2025-27, emphasizing commitment to Indian Ocean maritime cooperation.
- IONS founded in 2008, fosters regional maritime cooperation, serving as a forum for security discussions and relationship building.
- IONS is a voluntary initiative, that organises workshops and competitions for maritime security cooperation.



## INS Imphal

- INS Imphal was Commissioned as India's newest stealth destroyer, part of the Visakhapatnam class, showcasing indigenous technology and combat capabilities.
- Over 75% indigenous content, housing BrahMos missiles and advanced weaponry developed by Indian firms, reflecting self-reliance in defence.
- Advanced stealth features, speeds up to 56 km/h, and designed for nuclear, biological, and chemical warfare scenarios.
- BrahMos-equipped for supersonic missile launches and tailored for anti-submarine warfare with rocket launchers, torpedo systems, and modern surveillance radar.
- Constructed at Mazagon Dock Limited, notable for efficiency. Named after Imphal, paying homage to Manipur's role in India's freedom movement.
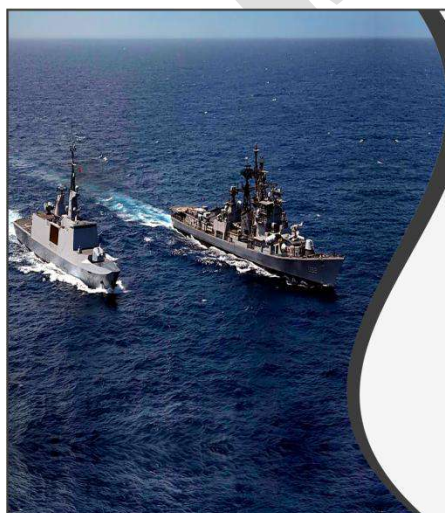


## Exercise Milan

- Indian Navy gearing up for its largest naval exercise, Exercise MILAN, in February 2024.
- Over 50 countries are expected to participate, reflecting the Navy's growing engagements and capacity in the Indian Ocean Region (IOR).
- Exercise MILAN is a biennial exercise held since 1995, a biennial event hosted by the Indian Navy.
- The 11th edition of the exercise, held from February 25 to March 4, 2022, off the coast of Visakhapatnam, Andhra Pradesh.

## Agni-1 Missile

- India successfully conducted a training launch of the Short-Range Ballistic Missile (SRBM) Agni-1 from APJ Abdul Kalam Island off the coast of Odisha.
- It was developed by the Defence Research and Development Organisation (DRDO) as part of the Integrated Guided Missile Development Program (IGMDP).
- It is a single-stage, solid-fueled missile with a range of about 700 to 1200 kilometres.
- It can carry a payload of up to 1,000 kilograms, which could include a conventional warhead or a nuclear warhead.
- It was first deployed in the early 2000s and has since undergone several upgrades. The latest version, the Agni-1P, has a longer range and improved accuracy.

## Table-Top Exercise

- The Indian Army conducted a five-day Table-Top Exercise (TTX) for women officers from the Association of Southeast Asian Nations (ASEAN) member countries.
- The exercise took place from December 4th to 8th, 2023, at the prestigious Manekshaw Centre in New Delhi, India.
- It was specifically designed to cater to the needs and challenges faced by women peacekeepers. It aimed to provide them with a platform to share their experiences, learn from each other, and enhance their skills in various aspects of peacekeeping operations.
- The TTX was organized by the Centre for United Nations Peacekeeping (CUNPK) in India, which is a premier training institution for peacekeeping personnel.
- The exercise was attended by women officers from all ten ASEAN member countries: Brunei, Cambodia, Indonesia, Laos, Malaysia, Myanmar, Philippines, Singapore, Thailand, and Vietnam.

## Operation Prosperity Guardian

- The United States has announced the creation of a new multinational task force called Operation Prosperity Guardian to combat Houthi rebel attacks on international maritime trade in the Red Sea.
- The task force will involve the navies of 10 countries: Bahrain, Canada, France, Italy, the Netherlands, Norway, Seychelles, Spain, the United Kingdom, and the United States.
- The Houthis have been launching attacks on merchant vessels in the Red Sea, forcing companies to re-route their shipping lanes.
- The Houthis are a Shia Islamist political and military organization that emerged in Yemen, in the 1990s.
- The Houthis possess a well-equipped and experienced military force, including ground troops, drones, and ballistic missiles.
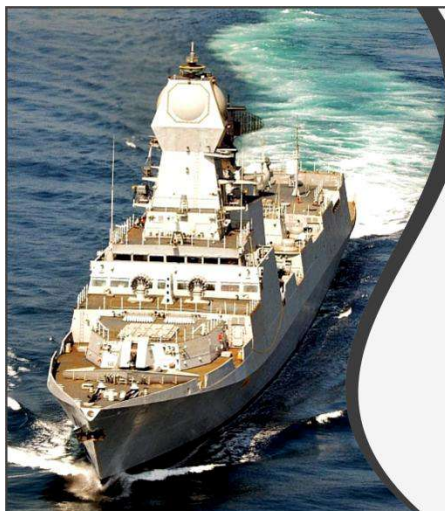
## INS Kochi

- Indian destroyer INS Kochi evacuated a Bulgarian sailor with a gunshot wound from the hijacked MV Ruen off the coast of Somalia.
- INS Kochi is a stealth guided-missile destroyer of the Indian Navy, built under Project 15A.
- It is equipped with advanced weapons and sensors, such as the BrahMos supersonic cruise missile, the Barak 8 long-range surface-to-air missile, the MF-STAR multi-function active phased array radar, and the HUMSA-NG sonar.
- It also has a COGAG propulsion system, a combat management system, and a network of digital systems.
- It can operate two helicopters and has a complement of 40 officers and 350 sailors.

## Central Industrial Security Force

- Following a security breach in the Lok Sabha, the Union Home Ministry has decided to deploy the Central Industrial Security Force (CISF) to take over the security of the Parliament complex.
- The CISF is a paramilitary force that provides security cover to vital installations of the country, such as airports, seaports, nuclear power plants, space facilities, and heritage monuments. It also protects VIPs and provides disaster management and firefighting services.
- The CISF was established in 1969 as a part of the Central Reserve Police Force (CRPF) but became an independent organization in 1983. It has a strength of over 1.5 lakh personnel and is headed by a Director General who reports to the Ministry of Home Affairs.

## 4.7   1 MAINS & 5 MCQs

**Q1. How is India addressing the current maritime security challenges, and what initiatives or policies has the country implemented to ensure the protection of its maritime interests and coastal areas?**

**Answer**
- India faces a range of maritime security challenges, from traditional piracy and terrorism to emerging threats like cyberattacks and environmental degradation. To address these, the country has implemented a multi-pronged approach encompassing infrastructure development, technological upgrades, regional cooperation, and policy initiatives.

**Infrastructure Development**
- **Modernizing the Indian Navy and Coast Guard:** Both forces are undergoing continuous modernization with advanced ships, aircraft, and surveillance technology like radars and drones. Initiatives like Project 75I submarines and Integrated Deepwater Operations centres are bolstering capabilities.
- **Coastal Infrastructure Development:** Construction of new ports, coastal radars, and communication networks enhances overall surveillance and response capabilities.

## Technological Advancements

- **Adoption of cutting-edge technologies:** The Indian Navy and Coast Guard are increasingly relying on artificial intelligence, big data analytics, and satellite imagery for enhanced maritime domain awareness.
- **Cybersecurity Initiatives:** Recognizing the growing threat of cyberattacks on maritime infrastructure, India has ramped up cybersecurity measures for ports and key systems.

## Regional Cooperation

- **Bilateral and Multilateral Agreements:** India has signed crucial maritime security agreements with several countries, including Bangladesh, Sri Lanka, Seychelles, and Maldives, for information sharing, joint patrols, and capacity building.
- **Forums and Initiatives:** India actively participates in regional forums like the Indian Ocean Rim Association (IORA) and Information Fusion Center-Indian Ocean Region (IFC-IOR) to enhance coordination and collaborative action against piracy, terrorism, and other threats.
- **SAGAR (Security and Growth for All in the Region) initiative:** This Indian initiative provides maritime security assistance to regional countries through capacity building, training, and equipment assistance.

## Policy Initiatives

- **National Maritime Security Strategy (NMSS):** This comprehensive strategy outlines India's vision for securing its maritime interests and guiding future policies and initiatives.
- **Focus on Blue Economy:** India recognizes the growing importance of the maritime economy and has launched initiatives to promote sustainable development and harness the potential of ocean resources.
- **Environmental Protection:** India actively participates in regional efforts to address marine pollution and climate change threats to the maritime environment.

## Addressing Current Challenges

- **Piracy:** While piracy has significantly declined in recent years, India remains vigilant, collaborating with regional and international partners to maintain anti-piracy patrols and share intelligence.
- **Terrorism:** Threats from non-state actors and maritime terrorism are closely monitored. Coastal vigilance and intelligence sharing are crucial in this regard.
- **Illegal Fishing:** Overfishing and illegal fishing threaten marine resources and coastal communities. India works with neighbours to implement sustainable fishing practices and combat illegal activities.
- **Cybersecurity:** India is continuously strengthening its cybersecurity measures to protect critical maritime infrastructure from cyberattacks.

India's multi-pronged approach to maritime security demonstrates its commitment to a secure and stable Indian Ocean Region. Continued investment in infrastructure, technology, and regional cooperation will be crucial to maintain its maritime security edge. However, challenges like resource constraints, inadequate infrastructure in some neighbouring countries, and evolving threats like unmanned aerial vehicles necessitate constant adaptation and refinement of strategies. By remaining agile and proactive, India can effectively safeguard its maritime interests and contribute to a safer maritime environment in the region.

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*Q2. Which of the following countries are the members of the Colombo Security Conclave (CSC):*

1. India
2. Sri Lanka
3. Maldives
4. Mauritius
5. Bangladesh
6. Seychelles

**How many of the above codes are correct?**

A) Only three
B) Only four
C) Only five
D) All six

**Q3. Consider the following statements in the context of the Table-Top Exercise (TTX):**

1. The Indian Army conducted Table-Top Exercise (TTX).
2. The TTX was organized by the Centre for United Nations Peacekeeping (CUNPK).
3. The exercise was attended by women officers from all ten ASEAN member countries.

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

A) Only one
B) Only two
C) All three
D) None

**Q4. Consider the following statements in the context of the Defence Acquisition Council (DAC):**

1. It was established in 2001 following recommendations after the Kargil War in 1999.
2. The council is chaired by the Minister of Defence.
3. It serves as the highest authority responsible for approving and guiding the acquisition of new defence equipment, technologies, and systems for the armed forces.
4. It plays a vital role in formulating defence acquisition policies, strategies, and frameworks aimed at enhancing India's defence capabilities and modernizing its armed forces.

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

A) Only one
B) Only two
C) Only three
D) All four

**Q5. Consider the following statements in the context of the Exercise VINBAX:**

1. The 4th edition of the Joint Military Exercise VINBAX, held in December 2023, in Hanoi, Vietnam.
2. The exercise between Vietnam, India and Bangladesh, fosters collaboration, interoperability, and knowledge sharing in peacekeeping operations.
3. The exercise contributes to regional stability and preparedness for potential peacekeeping missions.
4. The first edition of the exercise was held in Jabalpur, India.

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

A) Only one
B) Only two
C) Only three
D) All four

**Q6. What is the primary focus of "Operation Prosperity Guardian", recently making headlines?**

A) Combating drug trafficking in the Caribbean Sea
B) Addressing piracy in the Gulf of Guinea
C) Countering Houthi rebel attacks on maritime trade in the Red Sea
D) Aiding in humanitarian relief efforts in the Mediterranean Sea

**ANSWERS: 2) B, 3) C, 4) D, 5) C, 6) C**

# 5. ENVIRONMENT & ECOLOGY

## 5.1 AIR POLLUTION & MORTALITY

### Context

- The research found that air pollution from using fossil fuels in industry, power generation, and transportation accounts for 5.1 million extra deaths a year worldwide.

### Key details

- This equates to 61% of a total estimated 8.3 million deaths worldwide due to ambient (outdoor) air pollution from all sources in 2019, which could potentially be avoided by replacing fossil fuels with clean, renewable energy, the researchers said.
- These new estimates of fossil fuel-related deaths are larger than most previously reported values suggesting that phasing out fossil fuels



might have a greater impact on attributable mortality than previously thought.
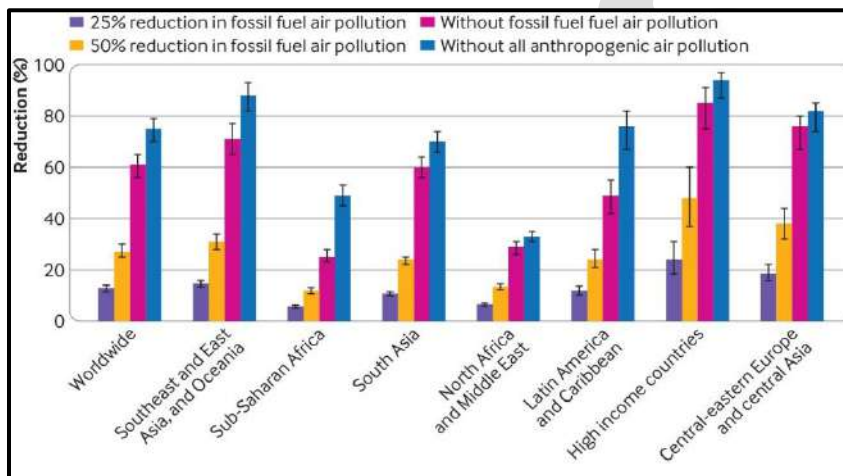
*The researchers found that most (52%) of deaths were related to common conditions such as ischemic heart disease (30%), stroke (16%), chronic obstructive lung disease (16%), and diabetes (6%). About 20% were undefined but are likely to be partly linked to high blood pressure and neurodegenerative disorders such as Alzheimer's and Parkinson's disease.*

### Findings of the BMJ study

#### The magnitude of the Issue

- Air pollution from fossil fuels in industry, power generation, and transportation contributes to an estimated **5.1 million extra deaths per year globally.**

#### Total Deaths from Ambient Air Pollution

- **In 2019, a total of 8.3 million death**s worldwide were attributed to ambient (outdoor) air pollution from all sources. Fossil fuel-related air pollution **accounted for 61% of these deaths.**

#### Comparison to Previous Estimates

- The estimates of fossil fuel-related deaths are larger than many previously reported values, suggesting that phasing out fossil fuels could have a more significant impact on mortality than previously thought.

#### Research Methodology

- The researchers used a new model to estimate all-cause and cause-specific deaths related to fossil fuel-related air pollution.
- **They considered various scenarios, including complete phase-out**, and assessed potential health benefits from policies replacing fossil fuels with renewable energy sources.

#### Excess Deaths and Attributable Conditions

- The concept of excess deaths, i.e., **deaths above the expected number**, was used to assess the impact of fossil fuel-related air pollution.

- The majority of these deaths were linked to common conditions such as **ischemic heart disease, stroke, chronic obstructive lung** disease, and diabetes.

## Geographical Distribution

- South and East Asia, particularly China and India, experienced the highest attributable deaths due to fossil fuel-related air pollution.
- The study emphasized that **phasing out fossil fuels** would lead to the largest absolute reductions in these regions.

## Health Benefits of Phasing Out Fossil Fuel

- The research underscores that replacing fossil fuels with clean, renewable energy sources would have significant public health benefits.
- **Phasing out fossil fuels could prevent a substantial number** of potentially avoidable deaths, aligning with the goals of the Paris Climate Agreement.

## Policy Implications

- **The study concludes that the ongoing COP28 climate change negotiations** offer an opportunity to make progress toward phasing out fossil fuels. The health benefits of such a transition should be a priority in policy discussions.

## 5.2 COASTAL EROSION IN INDIA

## Context

- Over one-third of India's coastline is vulnerable to erosion, Union Minister Ashwini Kumar Choubey told Lok Sabha on Monday, citing a study by the National Centre for Coastal Research (NCCR).

## Details

- According to this study, of the 116 beaches surveyed in Andhra Pradesh, 35 beaches are vulnerable to erosion and the rest are under accretion, while of the 50 beaches surveyed in Goa, 22 are facing erosion, and 28 are accretion.



## Key Observations of NCCR Regarding Coastal Erosion

### Shoreline Changes Analysis:

- The analysis conducted by the **NCCR utilized multi-spectral satellite images** and field-surveyed data from **1990 to 2016 to assess shoreline changes** along the entire Indian coastline.

### Causes of Coastal Erosion:

- Some stretches of India's shoreline experience varying degrees of erosion, attributed to both natural causes and anthropogenic activities.

### Shoreline Status:

- The overall analysis indicates that **34% of the Indian coast is experiencing erosion, 28% is accreting (gaining land), and 38% is in a stable state.**

### State-wise Analysis:
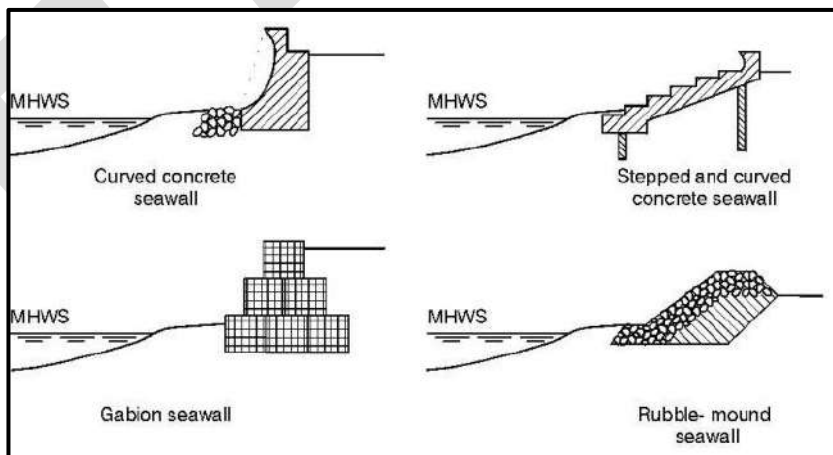
- The analysis breaks down the findings on a **state-wide basis, revealing varying degrees of erosion and accretion.**
- **West Bengal and Pondicherry coasts** have erosion **exceeding 50%, with West Bengal at 63% and Pondicherry at 57%.**
- Other states with significant erosion include **Kerala (45%) and Tamil Nadu (41%).**
- **Odisha** is the only coastal state with more than **50% accretion, indicating a gain in land in this region**.

### Impact on Livelihood and Habitat:

- The findings highlight the potential consequences of a receding coastline, including the loss of land and habitat.
- **Fishermen are particularly affected**, facing challenges such as a reduction in space for parking boats, mending nets, and conducting fishing operations.

### Concerns for Coastal Communities:

- **Coastal erosion poses a threat to the livelihoods of coastal communities**, especially those dependent on fishing activities.
- Loss of land and habitat can have a direct impact on the living and working conditions of people in these areas.

### Implications for Management and Planning:

- The observations underscore the importance of informed coastal management and planning to address erosion-related challenges.
- **Sustainable measures may be necessary to mitigate the impacts** of coastal erosion and ensure the resilience of coastal communities.

## What Government Measures have been Taken to Combat Coastal Erosion?

### Coastal Regulation Zone Notification, 2019:

- **The MoEFCC has issued the Coastal Regulation Zone Notification, 2019**, to conserve and protect coastal stretches and marine areas. The notification also ensures livelihood security for fishers and local communities.

### Erosion Control Measures:

- While coastal regulations are in place, the notification permits the implementation of erosion control measures along the coast to address erosion-related challenges.

### No Development Zones (NDZ):

- The **Coastal Regulation Zone Notification, 2019, provides for No Development Zones (NDZ)** along various categories of coastal areas. NDZs aim to protect India's coastline from encroachment and erosion.

### Flood Management Scheme:

- The **Ministry of Jal Shakti** oversees the **Flood Management Scheme, which includes anti-sea erosion** schemes planned and executed by state governments. The Union Government provides technical, advisory, catalytic, and promotional assistance to states based on their priorities.

### Coastal Management Information System (CMIS):

- CMIS is initiated under the Central Sector Plan Scheme *"Development of*

_**Water Resources Information System."**_ It involves data collection activities to gather nearshore coastal data for planning, designing, constructing, and maintaining site-specific coastal protection structures.

## Coastal Erosion Mitigation Measures:

- **Specific coastal erosion mitigation measures** have been undertaken at locations such as Puducherry and Chellanam in Kerala. These measures aim to restore and protect coastal areas, addressing issues like flooding in vulnerable regions.

## Technical Support to the Coastal States:

- The government extends technical support to coastal states in designing coastal protection measures for vulnerable stretches and in preparing **Shoreline Management Plans.**

## 5.3    COP28 SUMMIT

### Context

- A reference was held in COP28 to phase out coal and end fresh investments in coal.



### Details

- But this reference prevented India from endorsing a renewable energy pledge at the COP28 climate meeting.
- The pledge was mainly about tripling global renewable energy installed capacity by 2030.
- India's response to the climate pledge made by over 100 countries in COP28 reflects its nuanced stance on coal usage and its commitment to economic and developmental needs.

### Key points outlining India's position

#### Previous Backing in G20:

- India had previously supported the **pledge as part of the G20 grouping**, but it refrained from backing the same pledge in COP28.

#### References to Coal Phase-out:

- The pledge made in COP28 included references to coal phase-out and an end to fresh investments in the coal sector. **India did** not endorse the pledge due to these specific references.

#### Economic and Developmental Imperatives:

- India emphasized that its economic and developmental needs do not permit a sudden abandonment of coal.
- **The country plans to continue using coal for electricity generation** while concurrently increasing the capacity of renewable energy sources.

#### Sectoral Approaches:

- The pledge referred to curbing emissions from the **health sector and assessing greenhouse gas emissions** of health systems.
- **India has maintained its position against aligning** with such sectoral approaches outside the UNFCCC framework.

#### Not Part of COP Discussions:

- India highlighted that the pledge was not part of the **official COP discussions**.
- It was initiated by the host country as an effort to create alliances on specific subjects to generate momentum for climate actions.

#### No Legal Sanctity:

- Pledges and **alliances formed outside the official COP negotiations** have no legal sanctity and often lose momentum over time. India has traditionally been cautious about joining such platforms.

#### Not Negotiated Official Documents:

- Declarations and pledges made outside the COP negotiations are not negotiated documents and may lack the nuanced language found in official negotiations.

- India tends to avoid becoming part of initiatives that could potentially prejudice its positions in climate change negotiations.

#### Future Action on Renewable Energy:

- India is considering future actions aligned with discussions on **tripling global renewable energy capacities by 2030.**
- Estimates suggest that such a move could significantly **reduce carbon dioxide emissions**. These discussions are expected to take place within the COP process, where India may pledge its support.

#### Closing remarks

- India's response reflects its commitment to balancing economic development needs with environmental considerations. While refraining from endorsing specific pledges, India is likely to engage in discussions on renewable energy within the COP framework to contribute to global efforts in addressing climate change.

## 5.4   ENVIRONMENTAL IMPACT ASSESSMENT

### Context

- The research found that air pollution from using fossil fuels in industry, power generation, and transportation accounts for 5.1 million extra deaths a year worldwide.

### Key details

- The Chardham Mahamarg Vikas Pariyojayana, under which the Silkyara tunnel where 40 workers were trapped for 17 days was being constructed, was passed without necessary evaluation, as revealed by the Centre's response to a parliamentary query recently.
- Union minister of road transport and highways, admitted to having bypassed the environmental impact assessment norms for the civil works comprising the improvement of five existing national highways from Tanakpur to Pithoragarh section of the Kailas-Mansarovar yatra stretching over a length of 825 kilometers.

*As per the Union Ministry of Environment, Forest and Climate Change (MoEFCC), expansion of National Highways, more than 100 km involving the additional right of way or land acquisition greater than 40 m on existing alignments and 60 m on re-alignments or by-passes requires prior environment clearances (EC).*

### About Environmental Impact Assessment

- Environmental Impact Assessment (EIA) serves as a **crucial tool in project planning and decision-making** processes.
- It **is designed to comprehensively identify** and **evaluate** the potential environmental, social, and economic impacts of a proposed project before decisions are made.
- **The primary goal is to predict and understand** these impacts at an early stage, allowing for informed decision-making throughout the project lifecycle.

*According to the Food and Agricultural Organization (FAO), Environmental Impact Assessment is a formal process that aims to predict the environmental consequences of human development activities. **The key objective** is to plan and implement measures that **either eliminate or reduce adverse effects while enhancing positive impacts**. This formal process is integral to Environmental Management, ensuring a systematic approach to sustainable development.*

### Components of EIA

- **Identification of Impacts:** EIA involves a **detailed study to identify potential environmental**, social, and economic impacts of a project. This phase serves as the foundation for subsequent assessments.
- **Predictive Analysis:** The tool includes a predictive analysis to anticipate both positive and negative outcomes associated with the

development project. This foresight is crucial for making informed decisions.

- **Mitigation Strategies:** EIA goes beyond identification and prediction; it **actively seeks ways and means** to mitigate adverse impacts. This proactive approach aims to shape projects in a manner that aligns with and preserves the local environment.
- **Decision-Making Support:** EIA acts as a **decision-making support system for policymakers**. By presenting predictions and potential options, it empowers decision-makers to approve, reject, or explore alternative paths for a given project.

## Objective of EIA

- **Encouraging Harmony between Man and Environment:** The primary objective of Environmental Impact Assessment (EIA) is to formulate a national policy that fosters a harmonious relationship between human activities and the environment.
  - o This involves promoting a balance where development meets the needs of society without causing undue harm to the environment.
- **Prevention or Elimination of Environmental Damage:** Another key objective is to encourage efforts aimed at preventing or eliminating damage to the environment.
  - o Through systematic evaluation, EIA seeks to identify potential negative impacts of projects and initiatives, enabling proactive measures to mitigate or eliminate adverse effects.
- **Increasing Understanding of Ecological Systems:** EIA aims to enhance the understanding of ecological systems and natural resources crucial to the nation.
  - o By conducting assessments, it contributes to the knowledge base about the environment, aiding in informed decision-making for sustainable resource management.

## Significance of EIA / Benefits of EIA

### Facilitating Sustainable Development:

- Anthropogenic activities, such as rapid industrialization and deforestation, pose threats to the environment.
- **EIA serves as a tool to balance economic growth with the imperative** of sustainability, ensuring that development meets current needs without compromising the ability of future generations to meet their own needs.

### Mitigating Negative Impacts & Informed Decision-Making:

- **EIA plays a crucial role in minimizing** the negative impact of development projects. **By identifying potential environmental consequences**, it enables the establishment of monitoring programs.
- This data, in turn, empowers **decision-makers to make informed choices**, steering projects away from actions that could lead to environmental harm.

### Aiding Cost-Effectiveness:

- EIA contributes to the selection and design of **projects, programs, or plans with long-term viability**. This not only enhances the sustainability of initiatives but also improves cost-effectiveness by avoiding future losses.
- **Early assessments help prevent the need** for costly adaptations or corrections once a project is already underway.

## 5.5    ROADMAP FOR PLASTIC WASTE

## Context

- Union Minister Dr Jitendra Singh launched a flagship record on '**National Circular Economy Roadmap for reduction of Plastic waste in India**'.

## Details

- Union Minister Dr Jitendra Singh today released a flagship document **on 'National Circular Economy Roadmap for reduction of Plastic waste in India'**, a collaborative

exercise between leading research institutions from India and Australia.

- The document aims to foster research and industry partnerships between the two countries and co-develop a roadmap for India's transition to a circular economy in the Plastics sector.
- India and Australia are active participants in the negotiations for formulation of a Global Plastics Treaty to be finalized next year.
- Both countries aim to leverage their respective strengths in waste management, recycling policies, and environmental initiatives to foster a circular economy that prioritizes resource efficiency and environmental protection.

## About

- An **ongoing collaborative initiative between prominent research institutions in India and Australia focuses** on developing a comprehensive roadmap for India's transition to a circular economy within the plastics sector.
- **This joint effort aims to address key challenges** and formulate sustainable strategies for managing plastics, aligning with global environmental goals.

### Roadmap for Circular Economy:

- The collaborative exercise involves the creation of a roadmap that outlines strategic steps for India's transition to a circular economic model in the plastics sector.
- This roadmap is expected to provide a blueprint for sustainable practices, recycling initiatives, and waste reduction strategies.

### Participation in Global Plastics Treaty Negotiations:

- India and Australia actively participate in global discussions to formulate a **Global Plastics Treaty**.
- As engaged stakeholders, **both countries are contributing to the development** of a comprehensive framework that addresses the challenges posed by plastic waste on a global scale. The treaty is anticipated to be finalized in the coming year.

### Significance of the Collaboration:

- The collaboration between India and Australia signifies a shared commitment to addressing environmental concerns associated with plastics.
- By pooling expertise and resources, both nations aim to develop innovative solutions and contribute to the global effort to manage and reduce plastic waste.

## Key Areas for Policy Intervention

### Enhanced Recycling Infrastructure:

- Invest in and improve recycling facilities to boost the current 8% recycling rate and reduce the amount of plastic that ends up in landfills or incineration.

### Public Awareness and Education:

- Implement widespread awareness campaigns to educate the public about responsible plastic use, segregation, and recycling practices.

### Extended Producer Responsibility (EPR):

- Enforce EPR policies to hold manufacturers accountable for the life cycle of their products, encouraging sustainable and eco-friendly packaging.

### Innovation and Research:

- Foster research and development in sustainable alternatives to plastic and support innovations that reduce the environmental impact of plastic products.

### Policy Collaboration:

- Encourage collaboration between government bodies, industries, and environmental organizations to create a cohesive and effective approach in addressing the plastic waste crisis.

## National Circular Economy Roadmap for Reduction of Plastic Waste

- **Key roadmap findings display that via way of means of 2035:**
  - Two thirds of all plastics used will be recycled.
  - Single-use plastics will be phased out.

- o Diverting plastic waste into sources should result in 20-50 percent less greenhouse emissions.
  - o There could be stepped forward air quality.
- **Supportive Infrastructure**: Build a virtual spine of data, linking cloth glide facts from virgin plastics manufacturers.
- **Effective Recycling**: Radically enhance India's recycling capability, with government-finance-studies-enterprise collaboration.

- **Sustainable Consumption**: Choose merchandise with minimum plastics that might be recyclable and made with recycled content.
- **Awareness and Readiness**: Establish a 'zero-waste' tradition at enterprise, in offices, and at home.
- Strict waste control guidelines in enterprise, administrative and industrial establishments.

## 5.6   ABATEMENT AND REMOVAL OF CARBON EMISSIONS

### Context

- At the COP28 climate talks underway in Dubai, draft decisions thus far have referred to the abatement and removal of carbon emissions using carbon capture and storage (CCS) and carbon dioxide removal (CDR) technologies.

### Key details

- Considering the meaning of the word 'abatement' has become an important bone of contention, understanding the meaning and limitations of CCS is important – as also those of CDR.

*The draft decisions taken at COP28 in Dubai, the UAE have recommended the abatement and removal of carbon emissions using Carbon Capture and Storage (CCS) and Carbon-Dioxide Removal (CDR) technologies.*

### What are CCS and CDR?

- CCS refers to technologies that can **capture carbon dioxide ($CO_2$)** at a source of emissions before it is released into the atmosphere.
- **These sources include the fossil fuel industry** (where coal, oil, and gas are combusted to generate power) and industrial processes like steel and cement production.
- **CDR takes the forms of both natural means** like afforestation or reforestation and technologies like direct air capture, where machines mimic trees by absorbing $CO_2$ from their surroundings and storing it underground.

- **There are also more complex CDR technologies** like enhanced rock weathering, where rocks are broken down chemically; the resulting rock particles can remove $CO_2$ from the atmosphere.
- Other technologies like bioenergy with **carbon capture and storage (BECCS) capture** and **store $CO_2$ from burning biomass, like wood.**

*At COP28, the term "unabated fossil fuels" has come to mean the combustion of these fuels without using CCS technologies to capture their emissions. Draft decision texts point to a need to "phase out" such unabated fossil fuels. On the other hand, removal has been referenced in the context of the need to scale zero- and low-emission technologies and support forest restoration as a means to promote emission removal.*

### How well do CCS and CDR need to work?

- India initiates its inaugural winter expedition to the Arctic, marking a historic milestone. Himadri, India's research station, becomes the fourth Arctic station to be manned year-round, reflecting India's commitment to Arctic exploration.

### Arctic Region and Its Global Impact

#### Geographical Location:

- The Arctic Circle, situated north of **latitude 66° 34' N**, encompasses the Arctic Ocean, providing a unique geographical context for India's expedition.

## Climate Change Concerns:

- Scientific studies emphasize the Arctic's influence on global sea levels and atmospheric circulations, particularly due to the alarming rate of ice melt.

## Rising Temperatures:

- Over the past century, the Arctic region has witnessed a significant average temperature rise of 4 degrees Celsius, contributing to global climate change.

## Global Impact and Climate Mitigation

### Sixth Assessment Report (AR6):

- The United Nations IPCC's AR6 focuses on climate mitigation, with an emphasis on achieving the goal of limiting the world's average surface temperature increase to **1.5 degrees C.**

### Role of Carbon Dioxide Removal (CDR):

- The IPCC relies on CDR for projections related to achieving the **1.5 degrees C target**. Emission scenarios with a 50% chance of success assume the sequestration of 5 billion tonnes of $CO_2$ by 2040, surpassing India's current annual emissions.

### Challenges and Necessity of CDR:

- Dr. Ho, a prominent scientist, underscores the critical role of CDR in mitigating climate change. The report suggests that achieving emission reduction without CDR is challenging and would require an impractical decrease in reliance on fossil fuels.

### Dire Consequences of Inaction:

- Dr. Ho warns that without significant $CO_2$ reduction efforts, there is a **50% chance of exceeding the 1.5 degrees C limit within seven years.** Direct mitigation, such as transitioning to renewable energy sources, is deemed insufficient without substantial CDR.

## How well do CCS and CDR need to work?

### Key Assumption:

- **AR6 scenarios, with a 50% chance of limiting warming to 1.5 degrees Celsius**, hinge on the assumption that the global community can successfully sequester a staggering **5 billion tonnes of $CO_2$ by 2040**. Remarkably, this sequestration scale surpasses the current annual $CO_2$ emissions of India.

### Unprecedented Sequestration Scale:

- The **magnitude of $CO_2$ sequestration** envisaged by AR6 indicates an unprecedented scale of technological intervention. Such a feat demands advanced CDR technologies to be rapidly deployed on a global scale, challenging the status quo of current emissions.

### Indispensability of CDR Technologies:

- **AR6 leaves no room for ambiguity—achieving the 1.5 degrees Celsiustarget** is inconceivable without the integration of CDR technologies.
- These technologies play a pivotal role in offsetting emissions and are indispensable for meeting the stringent climate goals outlined in the report.

### Imminent Risk of Exceeding Threshold:

- **Current emission rates pose a substantial risk of surpassing the 1.5 degrees Celsius** threshold within a mere seven years. The urgency of the situation calls for innovative and accelerated deployment of CDR technologies to counterbalance emissions effectively.

### Challenges in Mitigation:

- Mitigating emissions solely through direct measures, such as the **adoption of renewable energy**, is deemed nearly impossible at this advanced stage. The report emphasizes the necessity of substantial reliance on CDR technologies to bridge the emissions gap and attain climate stabilization.

## 5.7    INDIA'S GREEN ENERGY PUSH

### Context

- India is pushing for more renewable energy like solar and wind, but it's facing challenges with intermittency (generation only when it's sunny or windy) and a lack of viable energy storage options.

### Details

- **The final climate deal that was reached at COP 28 did not** include a provision that would have required new coal-fired power plants to have carbon capture and storage technology.
- **This was the result of strong opposition from India and some other countries**, such as **China and South Africa,** who argued that such a requirement would limit their energy options and impose an unfair burden on developing nations.
- The stance taken by India and other nations against the inclusion of mandatory **Carbon capture and storage (CCS) for new coal plants at COP28** reflects a multifaceted perspective on addressing climate change.

### India's New Coal Thrust

- India's recent decision to increase its coal-powered generation capacity, **aiming to add 80 gigawatts (GW) of coal power by 2031-32,** marks a substantial departure from India's previous emphasis on renewable energy sources.
- **The government argues that coal is essential for India's economic growth** and energy security and that it will use advanced technologies to minimize the impact of coal burning.



- However, critics say that coal is a dirty and outdated source of energy and that India should invest more in renewable energy and energy efficiency. They also warn that coal mining will displace millions of people, destroy forests and wildlife habitats, and pollute water and air.
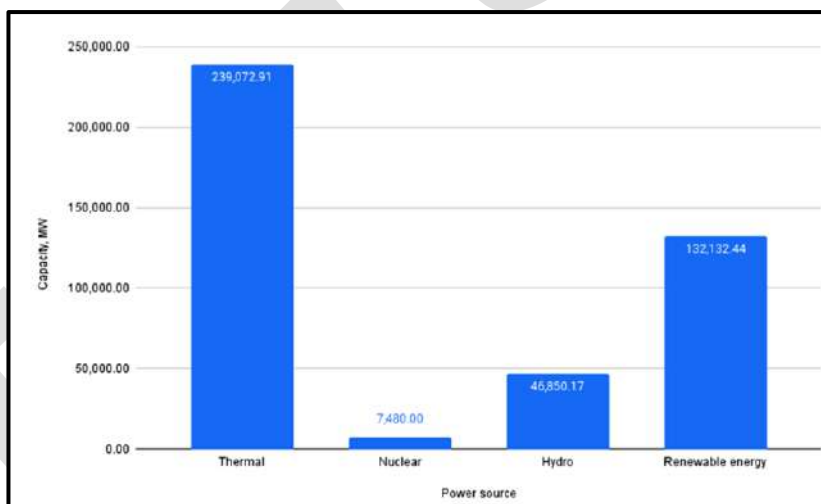
### Reasons for Pushback against Carbon Capture and Storage (CCS)

#### Cost and Viability Concerns:

- Affordability is a major hurdle, particularly for developing nations facing resource constraints. The additional expenses associated with implementing CCS technology can render coal plants economically unviable, deterring countries from adopting this approach.

#### Technical Challenges:

- CCS technology, still in its developmental stage, encounters technical challenges related to efficiency and scalability. These issues hinder the widespread application of CCS, raising doubts about its feasibility and practicality.

#### Resource Allocation Dilemma:

- The emphasis on CCS could lead to a diversion of resources from more mature and economically feasible renewable energy

technologies. This potential shift in resource allocation might slow down the overall transition to cleaner and sustainable energy sources.

### Developmental Priorities:

- Countries, especially in the developmental stage like India, prioritize reliable energy sources to support economic growth. They view coal, with or without CCS, as a crucial transitional bridge while investing in renewable alternatives. Balancing developmental needs with environmental concerns becomes a key consideration in such contexts.

## Implications of Omission

### Emissions Reduction Missed Opportunity:

- The exclusion of CCS from the final deal limits the potential for capturing and storing substantial $CO_2$ emissions from coal plants, affecting the overall ambition for emission reduction.

### Continued Fossil Fuel Reliance:

- The absence of immediate restrictions allows countries to proceed with new coal plant constructions, which might impede the global shift towards clean energy.

### Pressure on Existing Plants:

- The focus could shift to retrofitting existing coal plants with CCS, a complex and costly endeavor.

## Possible Future Scenarios

### Technological Progress:

- Advancements in CCS technology might render it more economically viable and efficient, altering future considerations for international agreements.

### Market Influences:

- Increased pressure from stakeholders and rising fossil fuel costs might accelerate the transition towards renewable energy sources.

### International Collaboration:

- Collaborative efforts between developed and developing nations could drive the development and deployment of more affordable CCS technology, facilitating a more equitable global transition.

## 5.8    RENEWABLE ENERGY IN INDIA

## Context

- India will witness more than 83% increase in investments in renewable energy (RE) projects to about $16.5 billion in 2024.

## Key details

- This is in line with India's ambitious target of having **500 GW of renewable energy by 2030** and its resolve to reduce overall **power generation capacity from fossil fuels to less than 50%.**
- India has committed to a **net zero emission target by 2070.**
- However, Union Power and New & Renewable Energy Minister R. K. Singh had said on many occasions that as much as 65% of power generation capacity would be from **non-fossil fuels by 2030** and that it would be higher than the set **target of 50%.**

*India is likely to witness 25 GW of renewable energy capacity addition entailing an investment of ₹1,37,500 crore (about $16.5 billion) in the 2024 calendar year, which would be higher than 13.5 GW with an investment of ₹74,250 crore (nearly $9 billion) seen in 2023.*

**FACTSHEET**

**HOW RENEWABLE ENERGY SHAPES UP**

## Current status in India

- **Global Status Report (GSR 2022)** presents a world map of country shares of renewable energy for the first time and emphasizes development in some of the top nations.

- **A record 135 nations committed to attaining net zero greenhouse gas emissions** by the year 2050 in the run-up to the **United Nations Climate Change Conference (COP26)** in November 2021.

- However, **only 84 of these nations had targets for renewable energy** across the whole economy, and only 36 had targets for 100% renewable energy.

- **REN21 (Renewable Energy Policy Network for the 21st Century)** published the Renewables 2022 Global Status

Report (GSR 2022). India was in third place behind China and Russia in terms of renewable energy installations in 2021.

*India aims to achieve 175 GW (100 GW from solar, 60 GW from wind) of renewable energy capacity by 2022 and 500 GW of non-fossil fuel capacity by 2030.*

## Benefits of Renewable energy

### Reliable Power Generation:
- Solar and wind power plants offer consistent electricity production, unaffected by regional weather disruptions.

### Zero Carbon Emissions:
- Renewable energy production leaves no greenhouse gases or pollutants, contributing to a cleaner environment.

### Energy Security:
- Renewable resources are infinite and don't deplete over time, ensuring a stable and secure energy source for the long term.

### Low Maintenance Costs:
- Solar energy, in particular, requires minimal fuel purchases and experiences less wear and tear due to limited mechanical movement.

### Pollution Reduction:
- Renewable technologies positively impact air quality and human health, aligning with Sustainable Development Goals.

### Empowering the Underprivileged:
- Renewable energy, like solar panels, enables the provision of electricity to underprivileged areas, fostering sustainable development.

## Challenges of Renewable energy

### Reliable Power Generation:
- Solar and wind power plants offer consistent electricity production, unaffected by regional weather disruptions.

### Zero Carbon Emissions:
- Renewable energy production leaves no greenhouse gases or pollutants, contributing to a cleaner environment.

### Energy Security:
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### Empowering the Underprivileged:
- Renewable energy, like solar panels, enables the provision of electricity to underprivileged areas, fostering sustainable development.

## Government initiatives

### India's Pioneering Ministry:
- India established the Ministry of New and Renewable Energy (MNRE) in 1992, aiming for 57% of electricity from renewables by 2027.

### Central Electricity Authority's Goals:
- India targets 275 GW of renewable energy, 72 GW of hydroelectricity, 15 GW of nuclear energy, and 100 GW from zero-emission sources by 2027.

### International Solar Alliance (ISA):
- Formed by India, the ISA unites 121 nations to promote efficient solar energy and reduce reliance on fossil fuels.

### Biomass and Bio-CNG:
- India focuses on cleaner biomass-based fuels and aims for a 20% petrol blend in bio-CNG cars to reduce urban pollution and foreign energy dependence.

### PM KUSUM and SRISTI Programs:
- Initiatives encouraging farmers to adopt renewable energy and providing financial incentives for rooftop solar power plants.

## Way Forward

### Transmission Infrastructure Development:

- Enhance both intrastate and interstate transmission infrastructure to facilitate renewable energy expansion.

### Strengthening Institutional Framework:

- Establish a robust institutional framework for efficient government funding flow and policy implementation oversight.

### Advance Policy Direction:

- Provide early policy direction to enable private sector planning and attract investment for renewable energy.

### Sector-Specific Energy Linkages:

- Identify high-energy consumption sectors and connect them with production sources to maximize energy use and meet fluctuating demand.

### Consistent Policy Framework:

- Maintain a stable and consistent policy environment to instill confidence in the private sector and encourage renewable energy adoption.

### Focus on Electric and Hydrogen Vehicles:

- Promote electric and hydrogen fuel cell-powered vehicles as a key transition to renewable energy sources.

## Conclusion

- Renewable energy emerges as the future's dominant energy source, potentially phasing out fossil fuels by 2050. A defined set of policy guidelines is crucial for integrating various energy sources efficiently into the grid, ensuring a cleaner and greener planet with an improved quality of life.

## 5.9 SHORT ARTICLES

# Climate Finance

### Context

- At COP28, climate finance is a key topic of discussion among the world governments of nearly 200 countries.

### Details

- The United Arab Emirates, which is hosting the ongoing COP28 climate summit, announced on December 1 that it would contribute $30 billion to a new fund aiming to divert private sector capital towards climate investments and improve financing for the Global South.
- UAE President Mohamed bin Zayed al-Nahyan said the fund was "specifically designed to bridge the climate finance gap" and stimulate further investment of $250 billion by 2030.

### About Climate Finance:

### About

- Climate finance is a crucial aspect of **global efforts to address climate change**, and it involves the mobilization and allocation of funds to support both mitigation and adaptation action.

### Scope of Climate Finance

- **Climate finance encompasses funds** obtained from various sources, including public, private, and alternative financing mechanisms. It can be sourced at the local, national, or transnational levels.

### Mitigation and Adaptation

- **Climate finance aims to support both mitigation** and **adaptation actions**. Mitigation involves efforts to reduce or prevent the emission of greenhouse gases, while adaptation focuses on building resilience and coping with the impacts of climate change.

### International Agreements

- The **United Nations Framework Convention on Climate Change (UNFCCC), the Kyoto Protocol, and the Paris Agreement** are key international agreements that emphasize the importance of financial assistance in addressing climate change.

### Principle of Common But Differentiated Responsibility and Respective Capabilities (CBDR-RC)

- Climate finance aligns with the **CBDR-RC principle,** which acknowledges that countries have common responsibilities to address

climate change but recognizes their differing capacities and vulnerabilities.

- It **emphasizes that developed countries, which historically contributed** more to emissions, should provide financial assistance to less endowed and more vulnerable nations.

## Paris Agreement

- **The Paris Agreement, adopted in 2015, specifically** outlines the goal of mobilizing financial resources to assist developing countries in both mitigating and adapting to climate change.
- Developed countries are urged to provide financial support, and a goal of **mobilizing $100 billion annually** by **2020 for climate finance is mentioned**.

## Multilateral and Bilateral Finance

- **Climate finance can be delivered through multilateral channels, such as the Green Climate Fund (GCF),** as well as through bilateral agreements between countries.
- The GCF, established under the UNFCCC, is a key mechanism to assist developing countries in climate-related projects and programs.

# Hydrogen for Heritage Scheme

## Context

- The Ministry of Railway is inviting expressions of interest from global players to manufacture hydrogen-powered trains in the country based on indigenously developed technology.

## Details

- The development of a hydrogen-powered train prototype by Indian Railways represents a significant step toward more environmentally friendly and sustainable transportation.

## Indian Railways Unveils Hydrogen-Powered Train Prototype:

### Hydrogen-Powered Train Prototype:

- Indian Railways is working on a prototype of a train powered by hydrogen fuel cells. This technology aims to provide a greener alternative to traditional diesel-powered trains.

### Global Context:

- Currently, Germany is the only country commercially operating hydrogen-powered trains, while the US, the UK, France, and Japan are in the testing phase. India's initiative aligns with global efforts to explore hydrogen as a clean energy source for transportation.

## What is the Hydrogen for Heritage Project?

- The Finance Minister announced the **'Hydrogen for Heritage' scheme in the Union Budget**, focusing on operating hydrogen-powered trains on select heritage and hilly routes that are environmentally sensitive.

### Retrofitting Technology:

- India's plan involves retrofitting hydrogen fuel cells on **diesel-electric multiple unit (DEMU) rakes**. The prototype is expected to initially operate on the **Jind-Sonipat section in Haryana**.

### Cost Estimates:

- The proposed plan includes running 35 hydrogen trains at an estimated cost of **Rs 80 crore per train.** Ground infrastructure for the routes is expected to cost Rs 70 crore per route.
- **Manufacturing costs for one rake of six coaches** with hydrogen propulsion are estimated at Rs 80 crore, and ground infrastructure is projected to cost Rs 600 crore.

### Sanctioned Projects:

- **Thirty-five train-set rakes (with six coaches each) have been sanctioned for the ongoing financial year**. These trains are planned for operation on heritage and hilly routes, including the Matheran Hill Railway, Darjeeling Himalayan Railway, Kalka-Shimla Railway, Kangra Valley, Bilmora Waghai, Patalpani Kalakund, Nilgiri Mountain Railways, and Marwar-Goram Ghat.

### Challenges and Initial Costs:

- **The Ministry of Railways acknowledges** that the initial running cost of hydrogen-powered trains may be higher. However, it anticipates a reduction in costs with an increase in the

number of such trains, suggesting a transition toward cost-effectiveness over time.

# Climate Club

## Context

- At the 28th Conference of Parties (COP28), leaders gathered to launch the Climate Club, focusing on decarbonizing the industrial sector.

## About Climate Club:

- **The Climate Club, led by Germany and Chile**, is an **international initiative involving 36 members**, collectively representing 55% of the global economy.

## Leadership and Membership:

- The Climate Club is led by Germany and Chile, and it includes 36 members. These members collectively contribute to 55% of the global economy.

## Objective:

- The primary aim of the Climate Club is to facilitate the decarbonization of industries. This involves aligning methodologies and standards, as well as improving finance and assistance for both emerging and developed economies.

## Focus on Hard-to-Abate Sectors:

- The Climate Club focuses on addressing hard-to-abate sectors, specifically targeting industries like steel, cement, and chemicals. These sectors are known for contributing approximately 70% of global industrial $CO_2$ emissions.

## Work Programme 2024:

- **The Climate Club has outlined a work program for the year 2024, which includes programmatic activities organized under three pillars:**
  - Advancing climate change mitigation policies.
  - Transforming industries.
  - Boosting international cooperation and partnership.

## Key Priorities and Actions:

- **Standardization**: The Climate Club is involved in developing standardized emission calculations for $CO_2$ intensities of products, such as steel and cement.
- **Net-Zero Definitions**: Strategic discussions are taking place within the Climate Club to define net-zero emissions for hard-to-abate sectors.
- **Financing Platform:** The initiative aims to establish a financing platform to match the needs of its members with financing from both the public and private sectors.

# Climate Change Performance Index

## Context

- India has been ranked seventh in climate performance during 2022- the report Climate Change Performance Index (CCPI) 2024.

## Details:

- The **Climate Change Performance Index (CCPI)** is a scoring system designed by the German environmental and development organisation **Germanwatch** to enhance transparency in international climate politics.
- **On the basis of standardised criteria**, the index evaluates and compares the climate protection performance of 63 countries and the European Union (EU).
- **The CCPI was first published in 2005** and an updated version is presented at the UN Climate Change Conference annually.
- Germanwatch publishes the index in cooperation with the **New Climate Institute** and **Climate Action Network International and with financial support from Barthel Foundation.**

## About Findings of Climate Change Performance Index (CCPI) 2024:

## India's Climate Performance Ranking

- **India holds the fourth position in the 'very high'** performance category, with the first three ranks unoccupied. This highlights **India's notable climate performance**, especially considering the lack of top performers in this category.



Components of the CCPI

## Global Decline in Developed Countries

- Major developed countries, including the **United Kingdom, the United States, and Italy, have witnessed a decline** in their climate performance compared to the previous year.
- This indicates a failure to **adequately address the urgency of actions** required to combat climate change.
- **Low Rankings for Saudi Arabia and United Arab Emirates**
- **Saudi Arabia ranks at the bottom (67th) in climate performance, while the United Arab Emirates occupies the 65th position.**
- These rankings underscore the need for enhanced efforts in these countries to address climate-related challenges.

## CCPI Targets for Emissions Reduction

- Countries assessed in the **Climate Change Performance Index (CCPI) are urged to achieve emissions peaks by 2025 to stay on track for the 1.5°C goal**.
- Furthermore, emissions must be halved by 2030 compared to 2020 levels to meet global climate targets.

## Global Increase in Greenhouse Gas Emissions

- Despite the urgent need for decarbonization across sectors, global greenhouse gas (GHG) emissions increased in 2022, with atmospheric **$CO_2$ now 50% higher than pre-industrial levels, as indicated in the report.**

## India's Population Dynamics and Climate Performance

- India's high population contributes significantly to its favorable climate performance.
- The per capita energy use is reduced, placing **India at the 9th position in GHG Emissions and 10th in Energy Use globally.**

# Global Cooling Watch Report

## Context

- Recently, The Global Climate 2011-2020: A Decade of Acceleration report was released.

## Details:

- The report was released at the UN Climate Change Conference, COP28.
- The report is based on physical data analyses and impact assessments from dozens of experts **at National Meteorological and** Hydrological Services, Regional Climate Centres, National Statistics Offices and United Nations partners.

## Key Highlights of the Report

- The **rate of climate change surged alarmingly between 2011-2020**, which was the **warmest decade on record.**
- Continued **rising concentrations of greenhouse gases** fuelled record land and ocean temperatures and turbo-charged a
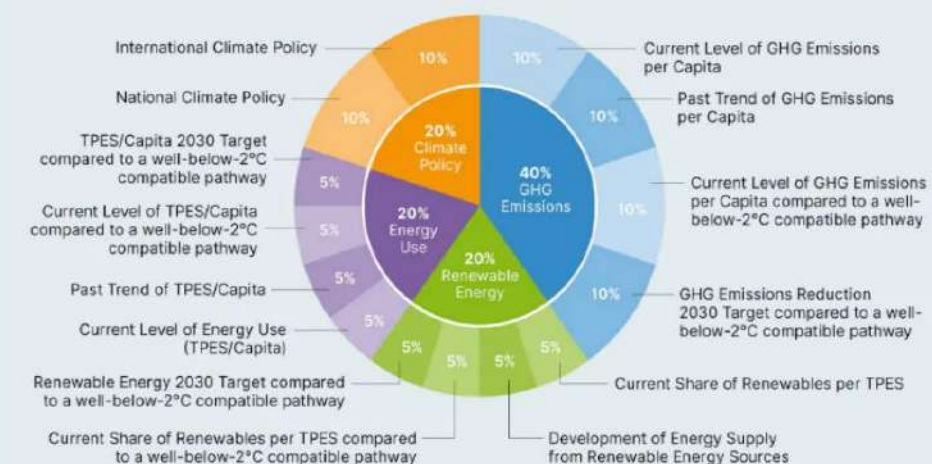
dramatic acceleration in ice melt and sea level rise.

- The Report documents how **extreme events across the decade had devastating impacts, particularly on food security**, displacement and migration, hindering national development and progress toward the Sustainable Development Goals (SDGs). But it also showed how **improvements in forecasts, early warnings and coordinated disaster management and response are making a difference**.

- The **number of casualties from extreme events has declined**, associated with improved early warning systems, even though economic losses have increased.

- **Public and private climate finance almost doubled between 2011 and 2020.** However, it needs to increase at least seven times by the end of this decade to achieve climate objectives.

- The Report **emphasizes the need for much more ambitious climate action to try to limit global temperature rise to no more than 1.5°C above the pre-industrial era.**

- The report provides **a longer-term perspective and transcends year-to-year variability in our climate**.

# Oil and Gas Decarbonization Charter

## Context

- Recently, Conference of Parties (COP28) President Dr. Sultan Al Jaber and the Kingdom of Saudi Arabia announced the official launch of the Oil and Gas Decarbonization Charter (OGDC).



## About the Oil and Gas Decarbonization Charter (OGDC):

- The Oil and Gas Decarbonization Charter (OGDC) represents a dedicated initiative within the oil and gas sector **aimed at addressing the pressing challenges posed by climate change**.

- This charter serves as a collaborative effort among key industry players to drive substantial impact in reducing carbon emissions and transitioning towards more sustainable practices.

## Key Objectives of the OGDC:

- **The primary goal of the OGDC is to induce significant positive changes** in the oil and gas sector, fostering a transition toward decarbonization.

- By committing to this charter, companies express their dedication to actively contribute to global efforts in combating climate change.

## Industry Participation and Impact:

- **Currently, the OGDC boasts participation from 50 companies**, collectively responsible for over 40 percent of global oil production.

- Notably, this broad industry engagement signifies a collective commitment to making a meaningful impact on global carbon emissions.

## Historic Participation of National Oil Companies:

- A **noteworthy aspect of the OGDC is the historic participation of National Oil Companies**, comprising over 60 percent of the total signatories.

- This **indicates a significant paradigm shift within the sector,** as traditionally prominent entities within the oil and gas industry actively embrace and commit to decarbonization efforts.

## Integral Role in the Global Decarbonization Accelerator (GDA):

- The OGDC is integral to the broader **Global Decarbonization Accelerator (GDA),** aligning its objectives with the global agenda for reducing carbon emissions.

- By being part of this larger initiative, the OGDC contributes to a coordinated and

accelerated approach to decarbonization efforts on a global scale.

## Key facts about the Global Decarbonization Accelerator:

- It was introduced at the World Climate Action Summit.
- The GDA focuses on three primary pillars:

  o Scaling the energy system of the future.
  o Decarbonizing the present energy system.
  o addressing methane and other non-CO2 greenhouse gases.

- This strategic plan aims for a comprehensive and simultaneous transformation of both energy demand and supply.

# Global River Cities Alliance

## Context

- Recently, the National Mission for Clean Ganga (NMCG) signed a Memorandum of Common Purpose (MoCP) with the Mississippi River Cities and Towns Initiative (MRCTI), representing 124 cities/towns along the Mississippi River in the United States.



## About River City Alliance (RCA)

- The RCA is a cooperative effort of the **Ministries of Jal Shakti (MoJS) and Housing and Urban Affairs (MoHUA)**, to connect river cities and focus on **sustainable river development.**
- The Alliance focuses on three primary themes: **networking, capacity building, and technical support.**
- The Alliance began with 30 member cities in November 2021 and has since grown to **110 river cities across India** and **one overseas member city from Denmark.**

## Objective

- The RCA aspires to encourage **online knowledge sharing for Indian cities** interested in learning innovative methods and approaches to **urban river management.**
- It would also provide international cities with the opportunity to learn about experiences in Indian cities that may apply to their situations.

## Significance

- It will **allow cities to learn from each other's achievements and failures** while also connecting people to rivers.

- It has the potential to play a critical role in connecting communities with their rivers, and it can serve as a model for all cities in the Basin and beyond.
- It will provide an opportunity for municipal administrators and their staff **to adopt innovative initiatives** while learning and inspiring one another.
- It allows towns to increase governance features for river cities and improves their liveability to attract external economic investments, access state-of-the-art knowledge and frameworks, and serve as the location for unique demonstration projects.

# Ennore Oil Spill

## Context

- As a thick layer of oil permeates the waters of Ennore Creek, fishermen mourn the loss of their livelihood and environmentalists warn of adverse impact on the area's marine ecosystem.

## Details

- In the calm waters of Tamil Nadu's Ennore Creek, a silent catastrophe is unfolding. A thick layer of oil now mars the once-scenic landscape – it can be seen everywhere, on the bottom of fishing boats, on fishing nets, on discarded household items, etc.
- The result of an oil spill caused by the floods in the aftermath of Cyclone Michaung, residents and environmentalists are worried about its long-term impact on the marine ecosystem and the health of the locals.

## What is an Oil Spill?

- *Oil spills refer to the release of **liquid petroleum hydrocarbons** into the environment, particularly in marine areas, arising from incidents **involving oil tankers, offshore platforms, drilling rigs, or wells**. These spills involve refined petroleum products, including gasoline, diesel, heavier ship fuels like bunker fuel, and various oily by-products.*

## Notable International Oil Spills:

- **Venezuela (2020):** Oil spill from the El Palito refinery.
- **Russia (Arctic, Norilsk):** Diesel spill in the Arctic region.
- **Mauritius (MV Wakashio):** A Japanese vessel carrying fuel oil split near Blue Bay Marine Park.

## Indian Oil Spill Cases:

- **Chennai (2017):** Collision off Kamarajar Port Limited caused a major spill.

- **Sundarban (2014):** Sela River oil spill in Bangladesh affecting India.
- **ONGC Uranium Plant (2013):** Leak into the Arabian Sea.
- **Mumbai Coast (2010):** Collision causing an 800-tonne oil spill.

## International Measures to Combat Oil Spills:

- **MARPOL (1973):** International Convention for the Prevention of Pollution from Ships by IMO.
- **Oil Pollution Preparedness, Response, and Cooperation (1990):** Facilitates international cooperation in responding to oil spills.

## India's Efforts to Prevent Oil Spills:

- **National Oil Spill Disaster Contingency Plan (NOS-DCP):** Aims at effective leak reporting, rapid response, and protection of health and the environment.
- **Merchant Shipping Act, 1958:** Empowers the government to take legal action against violators.
- **Indian Coast Guard:** Central coordinator for oil spills, conducts pollution control exercises.

## Control Measures in Case of Oil Spills:

1. **Bioremediation:** Use of microorganisms like OilZapper bacteria by TERI to break down oil.
2. **Oil Booms:** Temporary floating barriers for spill containment and recovery.
3. **Dispersants:** Chemicals sprayed onto spills to aid natural oil breakdown.

# UAE Consensus on Fossil Fuel

## Context

- Recently, the 28th Conference of Parties (COP-28) in Dubai has been described by some as being a mixed bag.

## Key Highlights of the Report

**The UAE Consensus: Ambitious Goals for Energy Transition**

- The UAE Consensus outlines a global call to transition away from fossil fuels, aiming for a just, orderly, and equitable shift. The goal is to achieve **net-zero emissions by 2050**, emphasizing both **rapid near-term actions and a long-term trajectory toward a zero-carbon future.**

## Commitments to Renewable Energy and Efficiency Goals

- The consensus includes agreements to triple the world's renewable energy capacity and **double its energy efficiency by 2030.These goals, endorsed by 130 countries at the start of COP**, reflect a collective commitment to accelerate action in the critical decade.

## Emissions Reductions in Road Transport: A Multifaceted Approach

- Countries are called upon to accelerate emissions reductions in **road transport, embracing various pathways beyond zero-emissions vehicles**. The emphasis extends to public transport and safe cycling infrastructure, reinforcing a comprehensive approach to sustainable transportation.

## Just and Equitable Transition: Considering Differing National Circumstances

- The consensus highlights the need for a just and equitable energy transition, recognizing the varying national circumstances of countries. **This foundational principle ensures that no one is left behind** in the pursuit of global climate goals, providing essential guidance for national policymaking.

## Financial Challenges in Renewable Investments: Unaddressed Issues

- While renewables are acknowledged as the most **cost-effective energy option**, the outcome falls short in addressing financial challenges. The initial investment requirements, impacted by interest rates and misaligned policies, pose barriers for developing countries, requiring **future attention in UN climate summits.**

## Loopholes and Challenges: Transitional Fuels and Carbon Capture

- Loopholes in the agreement raise concerns, particularly regarding support for **"transitional fuels," understood to reference natural gas**. The outcome also overlooks the limitations of carbon capture and storage (CCS) technology, emphasizing the need for caution in relying on these methods for significant emissions reductions.

## Industry Commitments: Net-Zero Pledges with Limitations

- The UAE and Saudi Arabia's charter commits participating companies to reach net-zero emissions by 2050 but only for their operations. **Critically, this pledge excludes the fuels sold by the industry, which constitute up to 95% of its contribution to the climate** crisis. Addressing both production and usage is deemed essential for meeting global climate goals.

## The Urgent Need for Comprehensive Government Action:

- The consensus underscores that governments must play a crucial role in requiring the oil and gas industry to address both production and fuel use. **Achieving climate goals necessitates substantial reductions** in demand for fossil fuels, emphasizing the importance of comprehensive government actions to drive systemic change.

# European Wood Bison

## Context

- The ongoing war in Ukraine could affect the efforts to save European Bison.



## About European Wood Bison:

- The European Wood Bison, scientifically known as **Bison bonasus or wisent**, stands as a distinctive species of bison native to Europe. **This robust mammal shares its genus with the American bison** and holds the

distinction of being Europe's heaviest wild land animal.

## Historical Significance:

- The European bison, once prevalent across Europe and Asia during late antiquity and the Middle Ages, faced extinction. **By the early 20th century, relentless hunting** led to their disappearance in the wild, surviving only in pockets of **northern-central Europe and the northern Caucasus Mountains.**

## Conservation Efforts:

- **Facing the imminent threat of extinction**, concerted efforts through captive breeding programs have successfully reintroduced the European bison into the wild.
- While the species, **numbering several thousand**, is **no longer critically endangered**, it remains absent from much of its historical range, underlining the ongoing challenges of habitat restoration.

## Cultural Significance:

- The European bison holds cultural significance, **being designated as one of the national animals of both Poland and Belarus.** This recognition underscores the species' importance in the collective identity and heritage of these nations.

## Current Conservation Status:

- The **European bison, Europe's largest land mammal, has experienced a positive shift in its conservation status.** Moving from **Vulnerable to Near Threatened**, this change reflects the success of continued conservation endeavors aimed at preserving and restoring the population of this iconic species.

# Pappathi Chola

## Context

- Pappathi Chola, known for its high butterfly population, derived its name from the Tamil word Pappathi meaning butterflies.

## Details

- Even as the government has suspended its plans to declare 364.5 hectares of land at Chinnakkanal as reserve forest, greens have called for urgent steps to protect Pappathi

Chola, a biodiversity hotspot, which is part of the area.

## What is Pappathi Chola?

- *Pappathi Chola, renowned for its vibrant butterfly population, derives its name from the Tamil word "Pappathi," meaning butterflies. The term "Chola" signifies shola land, with the region being a crucial stop for butterflies during their migratory journey from the rain shadow forests of Tamil Nadu to the higher elevations of Munnar.*

## Biodiversity Richness:

- Pappathi Chola serves as a hub for balsams, **particularly Impatiens balsamina**, and hosts rare varieties of **orchids**.
- Situated amidst the **Chathurangappara hills and Mathikettan shola**, this area witnessed the spectacular blooming of Neelakurinji last year, showcasing its biodiversity.

## Conservation Efforts by the Forest Department:

- Devikulam Range Officer P.V. Vegi highlights the Forest Department's ongoing efforts to protect Pappathi Chola.
- Despite being covered with **eucalyptus trees, an eco-restoration project has been initiated** to eliminate exotic species.
- The Forest department aims to incorporate the conservation of Pappathi Chola into the next working plan.

## Call for Immediate Government Action:

- Environmentalists, including M.N. Jayachandran, emphasize the urgency of government intervention to safeguard **Pappathi Chola's biodiversity hotspot.**
- With its unique flora and fauna, the area requires immediate attention and protective measures.

## Controversial Incident in 2017:

- **Pappathi Chola gained attention in 2017** when a Revenue department team, led by former Devikulam Sub collector Sreeram Venkitaraman, demolished a large cross erected on government land.
- This incident adds a historical context to the region, underscoring the challenges it has faced.

# Black-necked Grebe

## Context

- Recently, in a rare bird sighting, a Black-necked Grebe was sighted in the Hokersar wetland.



## About Black-necked Grebe:

### About

- The Black-necked Grebe (Podiceps nigricollis) is a species **of waterbird belonging to the Grebe family.**

### Distribution

- The Black-necked Grebe (Podiceps nigricollis) has a widespread distribution, inhabiting various regions **across Europe, Asia, and Africa**.
- Specific populations can be found in countries such as Spain, France, **Turkey, China, India, and South Africa.**

### Habitat

- Breeds in freshwater habitats such as lakes, ponds, and marshes with **emergent vegetation**.
- During the non-breeding season, they can be found in a variety of aquatic habitats, including coastal areas, estuaries, and inland waters.

### Nesting

- **Construct floating nests made of plant material anchored** to vegetation in the water.
- **Typically lay a clutch of eggs,** and both parents take turns incubating them.

### Diet

- Primarily carnivorous, **feeding on fish, insects, and crustaceans**.
- Skilled divers, capable of submerging and chasing prey underwater.

### Migration

- **Some populations are migratory**, traveling long distances between breeding and wintering grounds.
- Migration routes may include stopovers at suitable wetlands.

### IUCN status

- Black-necked Grebe is generally assessed as **"Least Concern" on the IUCN Red List.**
- This designation suggests that the species is not currently facing a high risk of extinction.
- **Ongoing monitoring of populations**, habitats, and potential threats is crucial for maintaining the species' conservation status.

# Red Tide

## Context

- A three-member committee appointed by the principal Bench of the National Green Tribunal (NGT) on Wednesday inspected the Kuruchikuppam drain and beach to analyze the cause behind the recent phenomenon of the sea turning red in Puducherry.

## Details:

- Taking suo motu cognizance of a news report published in The Hindu about a reddish tinge observed on the northern side of the Promenade Beach on October 17, the Bench comprising Justice Prakash Shrivastava and expert member A.
- Senthil Vel ordered the panel to ascertain the cause of the color change and take remedial action to prevent such an incident in the future.

## Causes of Red Tide:

- Red tide is primarily caused by the proliferation of a toxic algae **species known as Karenia brevis**. These algae multiply rapidly, forming blooms that result in the discoloration of water, often appearing reddish-brown.
- The **brevetoxins produced by these algae can be harmful to aquaticlife**, including fish and marine mammals, and pose health risks to humans.

- **Additionally, red tide events may lead to reduced sunlight penetration** and depletion of oxygen levels in the affected water.
- **The devastating impact of red tide** is evident in the significant marine life losses recorded, such as the over 2,000 tonnes of marine life deaths between 2017 and 2018.

### Occurrence of Red Tide:

- Red tide typically occurs during the warmer months of summer and spring when **sunlight is abundant.**
- The **warm, slow-moving water during this period** provides favorable conditions for the rapid multiplication of algae.
- Nutrient-rich waters, resulting from the thawing of ice in rivers, contribute to the development of algal blooms. The areas where brackish and marine waters mix are more susceptible to red tide occurrences.

### Algal Bloom in India:

- Yes, algal blooms occur in India, with the west coast being more prone to such events. Various types of algae, **including diatoms, cyanobacteria, haptophytes, and raphiphytes, contribute to algal blooms** in the country.
- The majority of these blooms occur during the retreat of the **southwest monsoon and the pre-monsoon period.**
- The west coast, despite having fewer nutrients compared to the east coast, experiences more algal blooms due to favorable temperature and water current conditions.
- While the East Coast is richer in **nutrients due to the presence of numerous rivers**, the West Coast's combination of suitable temperature and water flow makes it more susceptible to algal proliferation.

## 5.10   SNIPPETS

### Double Humped Camels

- Bactrian camels, also known as double-humped camels, are mainly used for carrying goods but are also popular among tourists for safaris in the Nubra Valley in the Union Territory.
- Bactrian (double-humped) camels are deployed in Eastern Ladakh as an innovative means for last-mile delivery of critical load and mounted patrolling in the sandy terrain of the plateau.

### Loss and Damage Fund

- The loss and damage fund is a global financial package to ensure the rescue and rehabilitation of countries facing the cascading effects of climate change.
- This fund recognizes and aims to compensate for the real losses incurred by communities, countries, and ecosystems due to the impacts of climate change.
- These losses extend beyond monetary value and cut to the core of human rights, well-being, and environmental sustainability.
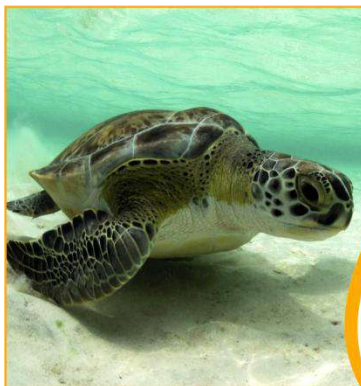
## Green Turtles

- The green sea turtle (Chelonia mydas), also known as the green turtle, black (sea) turtle, or Pacific green turtle, is a species of large sea turtle of the family Cheloniidae.
- It is the only species in the genus Chelonia.
- Its range extends throughout tropical and subtropical seas around the world, with two distinct populations in the Atlantic and Pacific Oceans, but it is also found in the Indian Ocean.
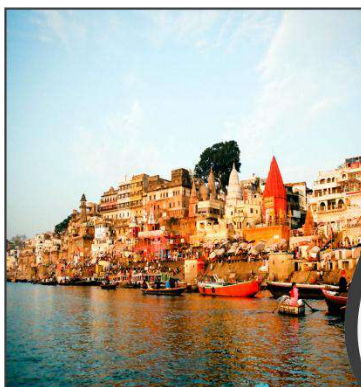
## National Mission for Clean Ganga

- National Mission for Clean Ganga(NMCG) was registered as a society in 2011 under the Societies Registration Act 1860.
- It acted as the implementation arm of the National Ganga River Basin Authority(NGRBA) which was constituted under the provisions of the Environment (Protection) Act (EPA),1986.
- NGRBA has since been dissolved in 2016, consequent to the constitution of the National Council for Rejuvenation, Protection and Management of River Ganga (referred to as National Ganga Council) under EPA 1986 (Amendment) Order in 2019.

## Miyawaki Plantation Method

- The Miyawaki method is an afforestation technique for cultivating fast-growing groves of native plants, with the dense, mixed planting intended to simulate the layers of a natural forest.
- It was developed in the early 1970s by the late Japanese forest ecologist Akira Miyawaki.
- Miyawaki forests grow rapidly, increase soil- and forest biodiversity, increase carbon sequestration, increase forest resilience, and reduce maintenance costs.

## Chum salmon

- It is native to the coastal rivers of the North Pacific and the Beringian Arctic and is often marketed under the trade name silverbrite salmon in North America.
- The term 'Dog Salmon' is most commonly used in Alaska and refers to the Salmon whose flesh Alaskans use to feed their dogs.
- They are found throughout the North Pacific Ocean and range from the Arctic coast of Canada and throughout the northern coastal regions of North America and Asia.
- Chum Salmon are listed as threatened under the Endangered Species Act.

## Himalayan Air Safari

- The country's first Himalayan Air Safari was launched from Uttarakhand. Uttarakhand has become the first state in the country to start Gyrocopter Adventure.
- This is a unique initiative to promote adventure tourism in the state. The Tourism Department has received DGCA approval for air safari through gyrocopter.
- Single seater aerocopter has been purchased from Germany. This will promote adventure tourism. A Gyrocopter trial was conducted in Haridwar.
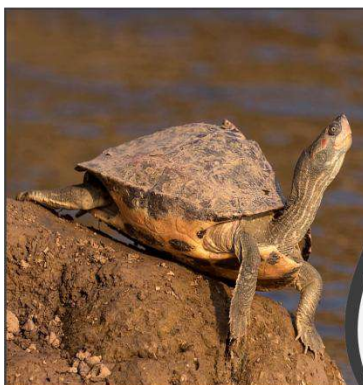
## Indian Tent Turtle

- The Indian tent turtle (Pangshura tentoria) is a species of turtle in the family Geoemydidae.
- The species is found in India, Nepal, and Bangladesh.
- tentoria is found in Peninsular India, Nepal, and Bangladesh at elevations below 80 m.
- The Indian Tent Turtle is a protected species under Schedule 1 of the Wild Life (Protection) Act, 1972.
- IUCN: Lower Risk/ least concern
- IWPA: Schedule I
- CITES: Appendix II

## Greenwashing

- Greenwashing is a corporate practice when a company makes a false environmental claim about its products and other initiatives.
- This practice overestimates the positive efforts of the company towards climate change and the environment.
- Hence it conveys a false impression or misleading information about so-called environmentally sound products of the company.
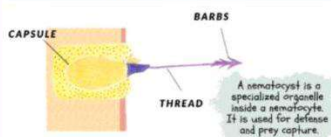
## Nematocyst

- Nematocysts are specialized cells found in Cnidarians which include jellyfish, corals, sea anemones, and hydras that serve as potent weapons for hunting prey and defending against predators.
- Each nematocyst contains a capsule with a coiled, thread-like tubule and toxins capable of rapid ejection with an acceleration surpassing that of a bullet.

## Namdapha Flying Squirrel

- The Namdapha flying squirrel (Biswamoyopterus biswasi) is an arboreal, nocturnal flying squirrel endemic to Arunachal Pradesh.
- The known habitat is tall Mesua ferrea jungles, often on hill slopes in the catchment area of the Dihing River (particularly on the western slope of the Patkai range) in northeastern India.
- The Namdapha flying squirrel is listed as critically endangered by the IUCN.

## 5.11 1 MAINS & 5 MCQs

*Q1. Discuss the causes, consequences, and mitigation strategies related to coastal erosion in India. Examine the impact on communities, the environment, and the economy. What measures can be adopted at national and local levels to address the challenges posed by coastal erosion?*

### Answer

- Coastal erosion in India has emerged as a pressing environmental concern with far-reaching implications for communities, ecosystems, and the economy. The dynamic interplay of natural processes and anthropogenic activities has intensified the vulnerability of coastal regions. Understanding the causes, consequences, and potential solutions is crucial for sustainable coastal management.

### Causes of Coastal Erosion

- **Coastal erosion in India can be attributed to natural factors** such as tidal and wave actions, as well as human-induced factors like unchecked urbanization, improper land-use practices, and climate **change-induced sea-level rise.**
- The degradation of natural buffers, such as mangroves and sand dunes, further exacerbates the problem.

### Consequences of Coastal Erosion

- **The consequences of coastal erosion are multifaceted**. Displacement of coastal communities, loss of valuable land, and damage to critical infrastructure are immediate concerns.
- Additionally, the **erosion-induced alteration of coastal ecosystems** affects biodiversity and disrupts traditional livelihoods like fishing and agriculture. Economic ramifications extend to reduced tourism, affecting coastal economies.

### Mitigation Strategies

- **Mitigating coastal erosion** requires a holistic approach. Implementing sustainable land-use practices, restoring mangrove ecosystems, and constructing coastal protection structures are key strategies.
- **Integrating climate-resilient infrastructure** and community-based adaptation measures are imperative.
- Moreover, **adopting advanced technologies** for early warning systems and shoreline monitoring enhances preparedness.
- Addressing coastal erosion in India demands a comprehensive strategy that combines natural resource conservation, sustainable development practices, and community engagement. Balancing the needs of development with environmental preservation is crucial for the long-term resilience of coastal regions. A collaborative effort involving government agencies, local communities, and environmental organizations is essential to safeguarding India's vulnerable coastlines and ensuring a sustainable future.

## Q2. Consider the following statements with reference to Bactrian Camel:

1. It has tolerance for cold, drought, and high altitudes.
2. It is the largest mammal in its native range and is the largest living camel.
3. Its body mass can range from 300 to 1,000 kg.

**Which of the above statements is/are correct?**

A) 1 and 3 only
B) 2 only
C) 3 only
D) All

## Q3. Consider the following statements:

1. The European bison is the heaviest wildland animal in Europe.
2. It is critically endangered.
3. The European bison is one of the national animals of Poland and Belarus.

**Which of the above statements is/are correct?**

A) 1 and 3 only
B) 2 only
C) 3 only
D) All

Answer: A) 1 and 3 only

## Q4. Consider the following statements with reference to Indian Tent Turtle:

1. The Indian Tent Turtle is a protected species under Schedule 1 of Wild Life (Protection) Act, 1972.
2. It is found in India only.
3. Females are largely herbivores while males and juveniles are more carnivorous.

**Which of the above statements is/are incorrect?**

A) 1 and 3 only
B) 2 only
C) 3 only
D) All

## Q5. Consider the following statements:

1. Black-necked Grebe is considered as Critically endangered in the IUCN Red List.
2. Black-necked Grebe is primarily carnivorous, feeding on fish, insects, and crustaceans.
3. Hokersar Wetland is situated in the Jehlum River basin.

**Which of the above statements is/are incorrect?**

A) 1 only
B) 2 only
C) 3 only
D) All

## Q6. Consider the following statements with reference to Namdapha flying squirrel:

1. The Namdapha flying squirrel is an arboreal, nocturnal flying squirrel endemic to Arunachal Pradesh.
2. The Namdapha flying squirrel is listed as endangered by the IUCN.
3. It is among the 25 "most wanted lost" species that are the focus of Re: wild's "Search for Lost Species" initiative.

**Which of the above statements is/are correct?**

A) 1 and 3 only
B) 2 only
C) 3 only
D) All

**ANSWERS: 2) D, 3) A, 4) B, 5) A, 6) A**

# 6. SOCIAL ISSUES

## 6.1 GENDER-RELATED KILLINGS OF WOMEN AND GIRLS

### Context

- About 88,900 women and girls were intentionally killed worldwide on the grounds of gender-related factors in 2022, a recent study from the United Nations Office on Drugs and Crime (UNODC) and UN Women shows.

### Findings of the Study

- The UN study titled *"Gender-related killings of women and girls (femicide/feminicide)"* showed that while the total number of homicides worldwide decreased in 2022, femicide increased.
- Women are more likely to be murdered by their partners or someone known to them. This extends from the fact that **women are subjected to physical violence mostly from their immediate family members.**
- This trend of women being more vulnerable to gender-related violence by family is prevalent across the globe.
- Across all regions, **the share of such homicides among women in which perpetrators are known was higher than in the case of men.** For instance, in over half the female homicides in Europe, the perpetrators are partners or related to the victims, whereas among men the share was only 18%. In the Americas, too, the disparity showed (45% among women homicides and 12% among men homicides).
- In 2022, **there were about 20,000 female victims of intimate partner/family-related homicide in Africa, the highest among continents**. The African continent exceeded Asia in femicides for the first time in 13 years. In Asia, 18,400 women were killed by their families during the same period. Notably, while the Americas reported 7,900 such cases, the rate of such femicides per 100,000 female population was 1.5, making it the second-highest after Africa, which had a rate of 2.8. Asia's rate was 0.8.
- Data also suggests that there **was a general trend of reduction in gender-related killings of women before 2021, though it increased drastically in 2021 and 2022, especially in Africa.**
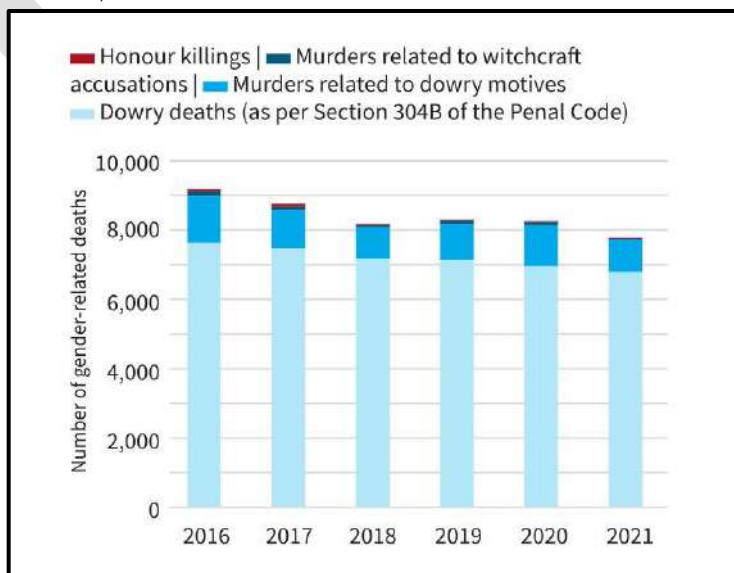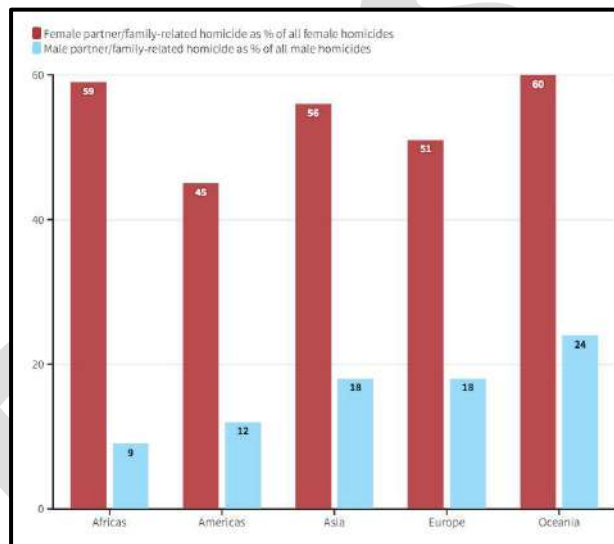
- According to three national studies conducted in South Africa across 18 years, the female intimate partner homicide rate halved between 1999 and 2017. But in recent years, the rate increased from 9 victims per 1 lakh women in 2019 to 12.7 victims per 1 lakh women at the end of 2022.

**Indian Scenario:**
- There has been a small *decline in gender-based killings in India* over the past decade.
  - The killing of women due to *dowry-related reasons*, accusations of witchcraft, and other gender-related factors still persist.
  - As per the study, the reasons behind gender-related deaths in India between 2016 and 2021, dowry has consistently been the leading cause while *honor killings and murder* related to witchcraft accusations formed a small share during this period.

- There has been **a small decline in gender-based killings in India over the past decade**. That said, **the killing of women due to dowry-related reasons, accusations of witchcraft and other gender-related factors still persists.**

- Dowry has consistently been the leading cause, while honour killings and murder related to witchcraft accusations, formed a small share too during this period.

## General recommendations for preventing Gender related killings of Women and Girls

### Ratify and implement relevant international and regional conventions

- Consider ways to enhance international cooperation in these cases, including by ratifying and implementing the United Nations Convention against Transnational Organized Crime and the Protocols thereto, the Convention on the Elimination of All Forms of Discrimination against Women and its Optional Protocol, the Convention on the Rights of the Child and the Protocols thereto, the Rome Statute of the International Criminal Court, the Protocol to the African Charter on Human and Peoples' Rights on the Rights of Women in Africa (Maputo Protocol), the Inter-American Convention on the Prevention, Punishment and Eradication of Violence against Women (Convention of Belém do Pará) and the Council of Europe Convention on Preventing and Combating Violence against Women and Domestic Violence (Istanbul Convention) and their follow-up mechanisms;

**Femicide**
- Femicide or feminicide is a term for the hate crime of systematically killing women, girls, or females in general because of their gender and/or sex.

**UNODC**
- The United Nations International Drug Control Program (UNDCP) and the Crime Prevention and Criminal Justice Division in the United Nations Office at Vienna were merged to form the Office for Drug Control and Crime Prevention. This was renamed United Nations Office on Drugs and Crime (UNODC) in 2002.
- The agency's focus is the trafficking and abuse of illicit drugs, crime prevention and criminal justice, international terrorism, and political corruption. It is a member of the United Nations Development Group.

### Use and adapt technical tools

- Consider translating and disseminating the Latin American Model Protocol for the Investigation of Gender-related Killing of Women, to be used as a model for regional and country-level adaptation, and training justice officials on its contents and use, in collaboration with relevant entities of the United Nations system;

### Review and update legislation

- Review, evaluate and update national laws to effectively address gender-related killing of women, including, where appropriate, by providing for specific offences or aggravating circumstances and by reviewing legislation to ensure that it does not include discriminating factors—"passion", "violent emotion", "honour" or "provocation"—that allow perpetrators to escape criminal responsibility;

## Develop capacity

- Strengthen the capacity of criminal justice institutions to prevent, investigate, prosecute, punish and remedy gender-related killing of women, including by: (i) Assessing the effectiveness of laws; (ii) Implementing training programmes and awareness campaigns; (iii) Identifying gender stereotypes and discrimination within institutions, providing adequate sanctions for discrimination, sexual misconduct and other misconduct, and ensuring that measures are taken to address them; (iv) Promoting the recruitment, employment and appropriate working conditions of women in the legal and law enforcement professions, especially at the decision-making level;

## Enhance coordination between all stakeholders

- Promote and enhance coordination, at all levels of government, between institutions mandated to prevent, investigate, prosecute, punish and remedy gender-related killing of women, as well as coordination with other relevant sectors, including civil society and the education, health, social services and security sectors;

## Provide human, technical and financial resources

- Provide sufficient human, technical and financial resources for the implementation of laws, policies, procedures and practices to prevent and respond to gender-related killing of women, including by adopting gender-sensitive budget policies as well as monitoring and accountability procedures;

## Monitoring and evaluation

- Monitor the implementation of laws, policies, procedures and practices and gender-sensitive budget policies to prevent and respond to gender-related killing of women, and evaluate their effectiveness and impact, including from a gender perspective, through transparent, participatory and inclusive processes;

## Analyse indirect forms of gender-related killing

- Collect and analyse data on indirect forms of gender-related killing of women, such as deaths due to poorly conducted and clandestine abortions; maternal mortality; deaths from harmful practices; deaths linked to human trafficking, drug dealing, organized crime and gang-related activities; the death of girls from simple neglect, through starvation or ill-treatment; and deliberate acts of omission by the State;

## Apply a gender perspective and involve stakeholders

- Analyse data from a gender perspective, involving, to the extent possible, relevant government agencies, civil society, academia, victims' representatives and the international community.

## Encourage reporting and early detection of violence

- Promote strategies and measures by relevant authorities and civil society to encourage the reporting and early detection of violence that may result in gender-related killing of women.

## 6.2    ADULTERY

### Context

- The Parliamentary Standing Committee on Home Affairs recommended the criminalization of adultery but on gender-neutral lines.

### What is adultery?

- Adultery is defined as voluntary sexual intercourse between a married person and someone who is not their spouse, was considered a criminal offense under Section 497 of the Indian Penal Code (IPC).

- This archaic law treated adultery as a violation of the sanctity of marriage, focusing solely on the extramarital conduct of men. It considered women as passive victims, incapable of committing adultery or being held responsible for their actions.

- Such a provision not only perpetuated gender stereotypes but also undermined the principle of gender equality enshrined in the Indian Constitution.

# Adultery law in India

- Currently, as per the adultery law in India, it is a ground for divorce but not a criminal offence. *Section 497 of the Indian Penal Code used to deal with the concept of Adultery.* It was struck own in the case *Joseph shine vs. Union of India* as the bench consisting of five judges realized the issues related, such as Gender inequality.

- This section only provided its power to the husbands and not to the wives. Husbands could file a case of adultery under this section against the wife but the wife didn't have the same right and the section says if the husband consents, then the extramarital relationship isn't adultery. **This law itself was violating the rights of a woman such as:**

- Article 14 (which provides equality before the law)

- Article 15 (right against discrimination)

- Article 19 (right to freedom- freedom of sexual expression)

- Article 21 (right to life)

- Section 497 portrays the wife as a husband's property or a woman as the property of a man. This law gives the husband the right to interrogate the adulterer but the wife does not have such provision under this law. This section only talks about the extramarital relationship of a husband with a married woman and not an unmarried woman, it equals permitting such a relationship with an unmarried woman.

- It forces the couples to compromise and adjust to a relationship in fear of the penal penalty.

- This is another ground on which section 497 was revoked. It tends to curb couples from fully expressing themselves sexually, resulting in them keeping a relationship alive just for the sake and not even getting a divorce as it can get them the punishment for adultery.

- Marriage is a social institution where a person can live freely and happily and it sets a foundation for the family, if the foundation itself is damaged then the family built on it won't survive. People will suppress their desire to get a divorce on the ground of adultery on the fear of punishment which can lead to all these problems later.

- These are the main reasons that lead to the revocation of Section 497. The Supreme Court of India now only recognizes adultery as a ground for divorce but not as a criminal offence.

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**Supreme Court Judgments on Adultery**

It is to be noted that Supreme Court on various occasions has determined the constitutional validity of the provision of adultery. It was only in 2018 that the Supreme Court declared it to be unconstitutional.

- *Yusuf Abdul Aziz v. State of Bombay (1954):* In this case, the Supreme Court held that adultery is not a criminal offense under the Indian Penal Code (IPC). The court stated that while adultery may be a moral wrong, it should not be treated as a criminal offense.

- *Sowmithri Vishnu v. Union of India (1985):* The Supreme Court, in this case, upheld the constitutional validity of Section 497 of the IPC, which deals with adultery. The court held that the provision doesn't violate the right to equality guaranteed under Article 14 of the Indian Constitution, as it only punished men for committing adultery and not women.

- *Joseph Shine v. Union of India (2018):* In this landmark judgment, the Supreme Court struck down Section 497 of the IPC as unconstitutional. The court held that the provision treated women as property and violated both the rights to equality and privacy. The court also observed that marriage is a personal choice, and criminalizing adultery interferes with individual autonomy under Article 21 of the Constitution.

The court further noted that Section 497 treated women as property of their husbands and perpetuated gender stereotypes. It recognized that women had agency and should be treated as equals, capable of making independent decisions regarding their personal lives. The judgment emphasized that marriage should be based on trust, mutual respect, and understanding rather than fear of criminal punishment.

Also, the Court made it clear that adultery is a realm of personal space and personal matter of the parties in which the courts or the law should not interfere.

- *Navtej Singh Johar v. Union of India (2018):* Although not directly related to adultery, this judgment played a crucial role in shaping the discourse around personal autonomy and privacy rights. The Supreme Court struck down Section 377 of the IPC, which criminalized consensual same-sex relationships. This landmark decision highlighted the importance of recognizing individual choices and dismantling discriminatory laws that infringed upon personal autonomy.

**In a nutshell,**

**Reasons behind decriminalization of Adultery**

- <u>Section 497 is arbitrary</u>: It has been pointed out in the judgment that the essence of Section 497 is subjective. For one the 'sanctity of marriage' is not maintained, since a husband can give consent to let his wife have an affair with someone else. Rather the judgment points out it helps to retain a husband's 'proprietary rights' over his wife. In addition, against her husband or his lover, the wife cannot file a lawsuit. There are no provisions for dealing with an unmarried woman or a widow having an affair with a married man.

- <u>Women can't be held captive by societal expectations</u>: Further, the judgment explicitly states, "It is not possible to ask a woman to think as a man or as society wants." Such a thought is abominable because it slaughters her core identity." In a society like India, the role and expectations of women are deeply rooted in society." It is, therefore, ground-breaking for the Supreme Court to remember that women cannot be compelled to behave according to the will of society.

- <u>A husband does not own his wife</u>: The judgment adds, "And, it is time to say that a husband is not the master. Equality is the governing parameter." Activists had slammed Section 497, saying it was totally "male-friendly" and that as long as it existed, it perpetuated the idea the wife was the husband's property.Historically, it was considered to be the "highest possible invasion of property," equivalent to stealing, because adultery interfered with the "husband's exclusive assets." It is clear from a reading of Section 497 that women are considered as subordinate to men inasmuch as it states that there is no offense when there is connivance or consent from the man. The woman is treated like a chattel by this. It treats her as man's property and totally subservient to the master's will. It represents the social superiority that was prevailing when the criminal provision, Joseph Shine v. Union of India, was drafted.

- <u>Section 497 is against</u> **Article 14 and 15** <u>of the Indian Constitution</u>: Article 14 guarantees equality to every citizen in India and Article 15 states that no one can be discriminated based on religion, race, caste, sex, etc. The court observed that the very nature of Section 497 was in contravention to this as it saw women as subordinates of men, and hence went against the Constitution of India.

- <u>Why should adultery be a criminal offense</u>: The judgment makes it amply clear that the legislation invaded an extremely private domain, that of marital life, by criminalizing the act. According to Article 21 of the Constitution, integrity and personal liberty are granted to all but by rendering adultery a criminal offense, dignity, and privacy are stripped of individuals. Justice Indu Malhotra wrote in her judgment, "The autonomy of an individual to make his or her choices concerning his/her sexuality in the most intimate spaces of life should be protected from public censure," thus asking whether it is a criminal offense at all. She added that it did not deserve to be listed as a criminal offense because <u>adultery was a moral wrong and not a societal wrong that influenced the lives of hundreds of others.</u>

- <u>Violation of dignity of woman and Article 21</u> – Dignity of the individual is a facet of **Article 21**. Section 497 effectively curtails the essential dignity which a woman is entitled to

have by creating invidious distinctions based on gender stereotypes which creates a dent in the individual dignity of women. Besides, the emphasis on the element of connivance or consent of the husband is tantamount to the subordination of women. Therefore, the same offends Article 21, Joseph Shine vs. Union of India.

*However, Adultery is still a ground for Divorce in India. Personal family laws have remedies provided under which your marriage has been solemnized. The Punjab and Haryana High Court had in 2019 observed that adultery as a ground for divorce cannot be considered without impleading the alleged adulterer.*

## Legal Provisions and Repercussions

Following the decriminalization of adultery, several legal provisions underwent significant changes. Some of the key aspects include:

1. **Section 497 of the IPC:** The Supreme Court declared Section 497 unconstitutional, effectively decriminalizing adultery. The provision was seen as an infringement on personal autonomy, privacy, and gender equality.
2. **Section 198(2) of the Code of Criminal Procedure (CrPC):** The court also struck down the provision that allowed only the husband to file a complaint against a man involved in an adulterous relationship with his wife. This amendment ensures gender neutrality by allowing both spouses to file complaints against their partners or third parties involved in adultery.
3. **Civil Consequences:** While adultery is no longer a criminal offense, it still holds civil consequences in terms of divorce proceedings and matrimonial disputes. Adultery can be considered as a ground for divorce if it can be proven that it has caused irretrievable breakdown of the marriage.

## Impact and Controversies

- The decriminalization of adultery sparked debates and controversies across society. Supporters argue that it is a step towards individual freedom, allowing adults to make choices regarding their relationships without fear of criminal repercussions.
- It promotes gender equality by recognizing women's agency and holding both spouses equally accountable for their actions. However, critics express concerns about the potential breakdown of the institution of marriage and family values.
- They argue that decriminalization may encourage infidelity and weaken the sanctity of marriage. Such concerns often stem from deeply rooted cultural and religious beliefs that view marriage as an inviolable bond.

## Parliamentary panel's recommendations recently

- The Committee suggested that adultery be reinstated as a criminal offence, but be made gender-neutral, thereby making both men and women equally culpable under the law. Highlighting the need to protect the institution of marriage, the report stipulates, "..the Committee is of the view that the institution of marriage is considered sacred in Indian society and there is a need to safeguard its sanctity.
- For the sake of protecting the institution of marriage, this section should be retained in the **Sanhita (Bharatiya Nyaya Sanhita) by making it gender neutral."**
- The Committee also pointed out that the revoked Section 497 of the IPC *"only penalized the married man, and reduced the married woman to be a property of her husband".* The proposed change also seeks to address this deficiency.

## Conclusion

- The decriminalization of adultery in India marks **a significant step towards personal autonomy, gender equality, and individual freedom.**

- The Supreme Court judgments recognized the importance of treating women as equals and emphasized the need to dismantle archaic laws that perpetuate gender stereotypes.
- While the decision faced its fair share of controversies, it is **a progressive move that aligns with the principles of a modern, inclusive society.**
- Moving forward, it is **crucial to address the civil consequences of adultery and continue fostering a society that values personal choices while upholding the sanctity of relationships.**

## 6.3    POSH Act, 2013

### Context

- ON 10 years after the Sexual Harassment of Women at Workplace (Prevention, Prohibition and Redressal) Act, 2013 came into force, those involved in its implementation say "the real challenge lies in providing redressal to women workers in the unorganized sector.

### Protection of Women from Sexual Harassment at Workplace Act, 2013

- The Protection of Women from Sexual Harassment at Workplace Act, 2013 is a landmark legislation in India aimed at preventing and redressing sexual harassment against women in the workplace. Below are the key features and provisions of the Act:

**Definition of Sexual Harassment:**

- The Act broadly defines sexual harassment to include unwelcome acts or behavior, whether directly or by implication, such as physical contact, making sexual remarks, showing pornography, or any other unwelcome conduct of a sexual nature.

**Applicability:**

- The Act applies to all workplaces, including both the organized and unorganized sectors, and covers women employees, irrespective of their employment status (permanent, temporary, contractual, etc.).

**Employer's Duties:**

- Employers are obligated to create a safe working environment for women, which includes preventing and redressing sexual harassment. They are required to establish an Internal Complaints Committee (ICC) at each office or branch with ten or more employees.

**Internal Complaints Committee (ICC):**

- The ICC is responsible for addressing complaints of sexual harassment. It must be headed by a woman and include at least two members from among employees committed to the cause of women or who have legal knowledge.

**Duties of ICC:**

- The ICC has the authority to receive complaints, conduct inquiries, and recommend appropriate actions. It is also tasked with monitoring the implementation of its recommendations by the employer.

**Complaint Mechanism:**

- The Act provides for the redressal of complaints through an internal complaints mechanism. If the complainant is not satisfied with the internal redressal, or if the employer fails to act, the complaint can be taken to the Local Complaints Committee (LCC) or the relevant authority.

**Local Complaints Committee (LCC):**

- The LCC is established in areas where the ICC cannot be constituted due to the nature of the workplace. It serves a similar purpose as the ICC for redressing complaints.

**Protection against Retaliation:**

- The Act prohibits retaliation against the complainant or witnesses. Any adverse action taken against the complainant in this regard is considered an offense.

**Penalties:**

- Non-compliance with the provisions of the Act can result in penalties, including monetary fines.

# Challenges to the implementation of the Protection of Women from Sexual Harassment at Workplace Act, 2013

## Lack of Awareness:

- Many employees and employers, particularly in smaller organizations and the unorganized sector, may not be fully aware of the provisions of the Act. This lack of awareness hampers the reporting and redressal of sexual harassment cases.

## Informal Workspaces:

- In informal and non-traditional workspaces, where employment relationships may not be well-defined, establishing Internal Complaints Committees (ICCs) becomes challenging, making it difficult to implement the law effectively.

## Fear of Retaliation:

- Despite legal provisions against retaliation, the fear of adverse consequences often discourages victims from reporting incidents of sexual harassment. The power dynamics within workplaces may contribute to this fear.

## Limited Representation in ICCs:

- The requirement of an external member in the ICC is not always fulfilled adequately. The selection of external members might lack transparency, affecting the credibility of the redressal process.

## Delayed Complaint Filings:

- The Act specifies a time limit of three months for filing complaints. However, victims often delay reporting due to fear, social stigma, or lack of confidence in the system, making it challenging to adhere to this timeline.

## Inadequate Training:

- Many organizations may not provide adequate training to employees, employers, and members of ICCs on the intricacies of the Act. Lack of training can lead to misinterpretation of the law and insufficient support for victims.

## High Workload on ICCs:

- ICC members, especially in larger organizations, may have heavy workloads, impacting their ability to promptly and effectively address complaints. This can result in delays and backlog in the resolution process.

## Unorganized Sector Challenges:

- The Act's applicability to the unorganized sector remains a challenge due to the informal nature of employment and the absence of structured grievance redressal mechanisms.

## Limited Accessibility to Legal Aid:

- Victims may face challenges in accessing legal assistance or aid due to financial constraints, lack of awareness about available support, or a complex legal process.

## Complexity in Cross-Border Cases:

- In workplaces with a multinational presence, addressing sexual harassment cases involving employees from different countries can be complex due to varying legal systems and cultural norms.

## Social Stigma:

- The societal stigma associated with reporting incidents of sexual harassment may prevent victims from coming forward, contributing to underreporting and making it challenging to address the issue effectively.

# Concrete solutions to enhance the effectiveness of the Act

## Awareness Campaigns:

- Conduct extensive awareness campaigns at the national and regional levels to educate both employers and employees about the provisions of the Act. This can be done through workshops, seminars, and digital platforms to reach a wider audience.

## Training Programs:

- Mandate regular training programs for employees, employers, and members of Internal Complaints Committees (ICCs) to enhance their understanding of the Act, promote a sensitive workplace culture, and ensure effective implementation.

## Sensitization Initiatives:

- Implement sensitization initiatives to foster a culture of respect and gender equality within workplaces. This can include campaigns promoting diversity and inclusion, and workshops on recognizing and preventing sexual harassment.

**External Member Selection Transparency:**

- Ensure transparency in the selection process of external members for ICCs, possibly through guidelines or regulations that emphasize diversity and independence in their appointment.

**Whistleblower Protection:**

- Strengthen whistleblower protection mechanisms to encourage individuals to come forward without fear of retaliation. Clear guidelines and procedures for protecting the identity of complainants can boost confidence in the reporting process.

**Fast-Track Resolution Mechanisms:**

- Establish fast-track resolution mechanisms within ICCs to expedite the investigation and resolution of complaints, preventing delays and backlogs.

**Capacity Building in Unorganized Sectors:**

- Develop tailored capacity-building programs for organizations in the unorganized sector, helping them establish ICCs and understand the importance of preventing sexual harassment.

**Legal Aid and Support:**

- Facilitate easier access to legal aid and support for victims by establishing helplines, legal clinics, or collaborations with NGOs to assist victims in understanding their rights and pursuing legal remedies.

**Cross-Border Collaboration:**

- Encourage cross-border collaboration between multinational organizations to establish uniform standards and procedures for addressing sexual harassment cases, taking into account legal and cultural differences.

**Periodic Audits:**

- Conduct periodic audits of organizations' compliance with the Act. This ensures that ICCs are functioning effectively, employees are aware of their rights, and employers are taking proactive measures to prevent sexual harassment.

**Social Awareness Programs:**

- Launch social awareness programs to combat the societal stigma associated with reporting sexual harassment. Media campaigns, documentaries, and community outreach can contribute to changing societal attitudes.

**Institutional Support:**

- Strengthen institutional support by creating dedicated units within government bodies to monitor the implementation of the Act, provide guidance to organizations, and address emerging challenges.

*Implementing these solutions collectively can contribute to a more robust and effective implementation of the Protection of Women from Sexual Harassment at Workplace Act, fostering safer and more inclusive work environments.*

## 6.5 REPORT ON CHILD MARRIAGE IN INDIA

### Context

- According to a new study published in the Lancet Global Health one in five girls and nearly one in six boys are still married below the legal age of marriage in India.

### Findings and Observations made by the Report

- There remains an urgent need for strengthened national and state-level policy to eliminate child marriage by 2030, say the researchers.
- The **Sustainable Development Goal (SDG) target 5.3** aims to end child marriage in girls by 2030 as part of a global commitment to "eliminate all harmful practices, such as child, early and forced marriage and female genital mutilation".
- For girls, the annual rate of reduction in the prevalence of child marriage must increase from 1.9 per cent to 23 per cent globally to meet the SDG target.
- India's success is **crucial in achieving the SDG target of 5.3.** The national rate of decline in child marriage during the last three decades has been considerable. However, previous research suggests that substantial variability

- of the rate of decline of child marriage at the sub-national level exists.
- Given that state governments tend to enact social sector policy in India, historical implementation of programmes to address child marriage has varied across and within states.
- Although there have been dramatic declines in child marriage during the last three decades, there is evidence of stagnation. The **largest reduction in child marriage occurred between 2006 and 2016**. Child marriage declined considerably during the study period (1993–2021 for girls and 2006–2021 for boys).
- The all-India prevalence of child marriage in girls **declined from 49.4 per cent in 1993 to 22.3 per cent in 2021** while that among the boys declined from 7.1 per cent in 2006 to 2.2 per cent in 2021.
- The researchers used data from five National Family Health Surveys from 1993, 1999, 2006, 2016,and 2021 to compile the study. They included 3,10,721 women aged 20–24 years between 1993 and 2021 and 43,436 men aged between 20 and 24 years between 2006 and 2021.
- Child marriage was defined as **marriage in individuals younger than 18 years for men and women.** They calculated the annual change in prevalence during the study period for states and Union Territories and estimated the population headcount of child brides and grooms.
- Researchers have noted that **substantial variation exists in the prevalence of girl and boy child marriages across the states and Union Territories during the study period.**
- All states, **except Manipur**, experienced a decline in the prevalence of girl child marriage between 1993 and 2021.
- The **largest absolute increase in headcount was observed in West Bengal**, representing an increase of 32.3 per cent in headcount. Jharkhand had the largest percentage increase in headcount (53.1%) between 1993 and 2021.

- Assam and Bihar also saw an increase in which more than 50,000 more women married early in 2021 (representing an increase of 13.1%) than in 1993 (representing an increase of 2·6%).
- Most states and Union Territories saw a decrease in the headcount of child marriage in girls between 1993 and 2021.
- Uttar Pradesh had the most substantial absolute decrease, which accounted for an estimated one-third of the all-India decrease in headcount of child marriage in girls observed between 1993 and 2021. West Bengal saw the largest absolute increase with over 500000 more girls married as children.

## Child Marriage in India: A Comprehensive Overview

- Child marriage in India is a persistent social issue with multifaceted implications. Addressing this topic in the UPSC Mains exam requires a comprehensive understanding of its various dimensions:

### Prevalence:
- Despite legal interventions, child marriage persists in many parts of India.
- Prevalence varies across regions, with higher rates in rural areas.

### Legal Framework:
- The Prohibition of Child Marriage Act, 2006, sets the legal age for marriage at 18 for females and 21 for males.
- Implementation challenges and societal norms often hinder effective enforcement.

### Causes:
- Rooted in socio-cultural factors, including poverty, lack of education, and gender norms.
- Economic factors and dowry practices contribute to perpetuating child marriages.

### Impact on Education:
- Child marriages often result in the discontinuation of education, especially for girls.
- Limited educational opportunities perpetuate cycles of poverty.

### Health Consequences:
- Early pregnancies in child marriages pose health risks for both mothers and infants.

- Higher rates of maternal and infant mortality are associated with early pregnancies.

### Gender Inequality:
- Child marriage reinforces gender inequality, limiting opportunities for girls and perpetuating patriarchal norms.
- Efforts to address child marriage intersect with broader gender empowerment initiatives.

### Government Initiatives:
- Programs like the Beti Bachao Beti Padhao campaign aim to promote the rights and education of girls.
- Government schemes provide financial incentives for delaying marriage and completing education.

## Laws Pertaining to Child Marriage in India
### Prohibition of Child Marriage Act, 2006:
- Sets the legal age for marriage at 18 for females and 21 for males.
- Prohibits solemnizing, permitting, or participating in child marriages.

### Indian Penal Code (IPC), 1860:
- Criminalizes sexual intercourse with a girl below 18, even if married.
- Imposes penalties for abetment of child marriage.

### National Plan of Action for Children 2016:
- Aims to end child marriage by 2030 through policy measures and awareness campaigns.

## Reasons Hindering Effective Enforcement
### Societal Norms and Acceptance:
- Deep-rooted societal acceptance of child marriages hinders reporting and enforcement.
- Resistance to change in long-standing traditions poses a challenge.

### Limited Awareness:
- Lack of awareness about legal provisions among communities and law enforcement officials.
- Many cases go unreported due to ignorance about the legal age of marriage.

### Economic Factors:
- Poverty compels families to view child marriage as a coping mechanism.

- Economic hardships can lead to a prioritization of immediate financial concerns over legal compliance.

### Inadequate Education:
- Limited educational opportunities, especially for girls, contribute to child marriage.
- Lack of awareness about the importance of education perpetuates early marriages.

### Weak Implementation Mechanisms:
- Inconsistent implementation of laws due to resource constraints and administrative challenges.
- Limited manpower and infrastructure for monitoring and enforcement.

### Customary Practices and Tradition:
- Deeply ingrained customs and traditions supporting child marriage.
- Reluctance to challenge these practices poses a barrier to effective enforcement.

### Religious Influences:
- Misinterpretation or misrepresentation of religious texts that may be perceived as supporting child marriage.
- Sensitivity required in addressing religious sentiments while enforcing the law.

### Underreporting and Non-Cooperation:
- Cases often go unreported due to fear of social stigma or retaliation.
- Non-cooperation from affected families or communities hampers enforcement efforts.

### Legal Loopholes:
- Some legal provisions may have loopholes that perpetrators exploit.
- Need for periodic legal reviews to strengthen and update existing frameworks.

### Local Governance Challenges:
- Ineffective local governance structures and lack of community involvement.
- Building community partnerships is crucial for successful enforcement.

### Limited Penalties:
- Penalties outlined in the Prohibition of Child Marriage Act may not be stringent enough.
- Revision of penalties to serve as a stronger deterrent.

### Challenges in Evidence Collection:
- Challenges in collecting evidence for legal proceedings.

- Ensuring witness protection and reliable testimonies is crucial.

## Case Laws

### Independent Thought v. Union of India (2017):

- The Supreme Court criminalized sexual intercourse with a minor wife, even if the girl is between 15-18 years old.
- This judgment addresses the issue of marital rape in cases of child marriage.

### Gulzari v. State of Haryana (2015):

- The court held that solemnizing a child marriage is an offense under the Prohibition of Child Marriage Act, 2006.
- This case emphasized the legal consequences for those involved in arranging or facilitating child marriages.

### Shakti Vahini v. Union of India (2018):

- The Supreme Court reiterated the significance of the Prohibition of Child Marriage Act, emphasizing its role in preventing child marriages and protecting the rights of children.

### Gram Panchayat of Village Kirti Nagar v. State of Haryana (2012):

- The court stressed the importance of local governance structures in preventing child marriages and urged Gram Panchayats to actively intervene in such cases.

### Joginder Kumar v. State of Haryana (2013):

- The court highlighted the duty of the police to prevent child marriages, emphasizing the need for proactive law enforcement in such cases.

## Challenges in combatting child marriage in India

- Combatting child marriage in India is a complex task that involves addressing various challenges rooted in socio-cultural, economic, and legal factors. Some of the key challenges include:

### Deep-Seated Social Norms:

- Prevailing social norms and traditions that endorse child marriage pose a significant obstacle.

- Resistance to change in deeply ingrained practices makes it challenging to alter societal attitudes.

### Poverty and Economic Factors:

- Economic hardships and poverty often drive families to marry off their children early.
- Lack of economic opportunities for families may lead them to view marriage as a means of economic relief.

### Limited Education Opportunities:

- Insufficient access to quality education, particularly for girls, is a contributing factor.
- Child brides are more likely to discontinue their education, perpetuating cycles of poverty.

### Gender Inequality:

- Deep-rooted gender inequalities contribute to the persistence of child marriage.
- Societal norms that prioritize the role of women as homemakers and caretakers perpetuate early marriages.

### Weak Enforcement of Laws:

- Inconsistent implementation of existing legal frameworks, such as the Prohibition of Child Marriage Act, 2006.
- Limited awareness of legal provisions and challenges in reporting and prosecuting cases.

### Lack of Awareness:

- Limited awareness about the adverse consequences of child marriage among communities.
- Awareness campaigns are crucial to informing communities about the legal age of marriage and associated health risks.

### Role of Religion and Tradition:

- Misinterpretation or misrepresentation of religious or traditional practices that support early marriage.
- Addressing misconceptions while respecting cultural diversity is essential.

### Rural-Urban Divide:

- Disparities in the prevalence of child marriage between rural and urban areas.
- Tailored strategies are needed to address the specific challenges faced in different settings.

### Customary Practices:

- Customary practices, such as dowry, may contribute to the perpetuation of child marriage.
- Addressing these practices requires a comprehensive understanding of local customs.

### Limited Access to Healthcare:
- Insufficient access to healthcare services, particularly for young mothers.
- Early pregnancies and childbirth pose health risks for both mothers and infants.

## Concrete Solutions to Stop Child Marriage
### Legal Reforms:
- Strengthen and enforce existing laws, ensuring strict penalties for offenders.
- Regularly review and update legal frameworks to address emerging challenges.

### Community Engagement:
- Raise awareness within communities about the negative consequences of child marriage.
- Encourage community-led initiatives to prevent and report cases.

### Education Promotion:
- Enhance access to quality education, especially for girls.
- Implement programs that incentivize families to prioritize education over early marriages.

### Empowering Girls:
- Empower girls through skill development and vocational training.
- Foster a sense of agency and self-confidence among young girls.

### Healthcare Access:
- Improve access to reproductive health services, including family planning.
- Conduct awareness campaigns on the health risks associated with early pregnancies.

### Economic Support:
- Provide economic support to families facing financial difficulties.
- Address economic incentives that contribute to child marriages.

### Community Leaders' Involvement:
- Engage religious and community leaders to advocate against child marriage.
- Leverage their influence to shift societal norms.

### School-Based Programs:
- Implement school-based programs that educate students about the consequences of child marriage.
- Establish support systems within schools for at-risk students.

### Legal Aid and Protection:
- Provide legal aid and protection for those at risk of or affected by child marriage.
- Establish helplines and support services for reporting and intervention.

### Media and Communication Campaigns:
- Utilize media platforms for awareness campaigns against child marriage.
- Challenge and reshape societal norms through positive portrayals of alternatives.

### International Collaboration:
- Collaborate with international organizations to share best practices and strategies.
- Benefit from global efforts to address child marriage through coordinated initiatives.

## 6.6 PAID MENSTRUAL LEAVE IN INDIA

## Context
- Menstrual leave, also known as period leave, became the subject of endless discussion and controversy on social media after the statement by Union Minister of Women and Child Development Smriti Irani.

## Menstrual Policy
- The Menstrual Policy is a work policy that permits women employees to take time off when they are uncomfortable or in pain during their menstrual cycle.

## Arguments about Paid Menstrual Leave
### Pros of Paid Menstrual Leave in India:
#### Health and Well-being:
- *Example:* Globally, studies suggest that acknowledging menstrual health needs through paid leave can contribute to improved well-being. In India, where cultural

attitudes towards menstruation influence women's experiences, paid menstrual leave can address health concerns.

## Gender Equality:

- *Data:* According to the Global Gender Gap Report 2021, India ranks 140th out of 156 countries in gender equality. Paid menstrual leave can be viewed as a step towards addressing gender disparities in the workplace.

## Productivity and Performance:

- *Statistics:* A study by the International Journal of Occupational and Environmental Medicine indicates that menstrual symptoms can impact work productivity. Paid menstrual leave might allow employees to manage symptoms and maintain productivity.

## Cultural Sensitivity:

- *Example:* India has diverse cultural practices and attitudes towards menstruation. Paid menstrual leave can be a culturally sensitive approach, acknowledging and respecting different perspectives on menstruation.

## Legal Compliance and Human Rights:

- *Legal Framework:* Paid menstrual leave can align with India's legal commitment to gender equality and human rights. It may complement existing legislation, such as the Maternity Benefit (Amendment) Act, in ensuring the well-being of female employees.

## Cons of Paid Menstrual Leave in India:

## Equality Concerns:

- *Data:* Concerns about potential discrimination or unequal treatment may arise. The fear of reinforcing gender stereotypes and creating divisions in the workplace is a key argument against paid menstrual leave.

## Operational Challenges:

- *Example:* Small and medium-sized enterprises may face operational challenges in implementing and managing a paid menstrual leave policy. Standardizing and regulating such leave across different industries could pose difficulties.

## Career Advancement:

- *Data:* There is concern that paid menstrual leave might impact career advancement for women. Employers might hesitate to hire or

promote women due to perceived absenteeism, potentially hindering professional growth.

## Impact on Workplace Dynamics:

- *Example:* Critics argue that introducing specific leave for one gender might create a divide in the workplace. There are worries about potential resentment among non-menstruating employees and the impact on overall workplace morale.

## Alternative Solutions:

- *Alternative Approaches:* Some argue that alternative solutions, such as flexible working hours, remote work options, or providing accommodations like comfortable workspaces, may be more practical and effective in addressing menstrual health without creating a separate leave category.

## Stigmatization:

- *Example:* The introduction of paid menstrual leave might unintentionally contribute to the stigmatization of women. Concerns about menstruation-related discrimination or bias in the workplace may arise.

# Way Ahead

## Health Awareness Drive:

- Launch national campaigns emphasizing the physical and mental health aspects of menstruation.

## Industry-Specific Research:

- Conduct studies on the impact of menstrual health on productivity in various industries.

## Collaborative Legislative Review:

- Form a task force involving lawmakers, health professionals, and women's rights advocates to review and refine legislative proposals.

## Metrics-Driven Pilot Programs:

- Implement pilot programs in organizations, measuring success through metrics like employee satisfaction and productivity.

## Corporate Recognition Program:

- Institute an annual recognition program for companies with exemplary menstrual health policies.

## Inclusive Policy Formulation:

- Establish a consultative platform with diverse stakeholders for inclusive policy formulation.

### Flexible Work Arrangements:

- Encourage businesses to adopt flexible work hours, remote work options, and designated rest areas.

### Health and Wellness Integration:

- Integrate menstrual health into workplace health programs, collaborating with healthcare providers.

### NGO Partnerships:

- Strengthen collaborations with NGOs specializing in women's health for insights and grassroots strategies.

### Period Products Accessibility:

- Advocate for accessible and free period products in workplace restrooms.

### Employee Feedback Mechanism:

- Implement a confidential feedback mechanism for employees to share experiences.

### Global Best Practices Research:

- Conduct a comparative analysis of global models for menstrual leave policies.

### Public-Private Partnerships:

- Establish partnerships between the government and private companies for comprehensive menstrual health programs.

## Closing Remarks

- In navigating the pros and cons of paid menstrual leave in India, a nuanced approach that considers cultural, legal, and workplace dynamics is essential.
- Policymakers, employers, and advocacy groups need to strike a balance that promotes inclusivity, addresses health needs, and ensures fairness in the workplace. Ongoing discussions, research, and collaboration will play a crucial role in shaping policies that meet the diverse needs of the workforce in India.

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## Here's a look at menstrual leave policies in other countries

### Spain

- Spain became the first nation in Europe to offer its female citizens menstruation leaves. It passed the bill in February 2023. According to the policy, women who experience severe menstruation symptoms, such as intense cramps, nausea, vertigo, or vomiting, have the option to take up to three days of menstrual leave every cycle. However, as the paid leave is funded by Spain's public social security system, employees require a medical note for each application.

### Japan

- Article 68 of the Labour Standards Law of Japan, which was approved in 1947, states: "A woman for whom work during menstrual periods would be difficult has requested leave, the employer shall not employ such woman on days of the menstrual period".
- Even though the law requires companies to allow women to take leave, it does not mandate them to provide paid leave or extra pay for women who choose to work during menstruation.

### Indonesia

- The Indonesian government introduced the menstrual leave policy in 1948 and restructured it in 2003. The policy states that female employees who are having menstrual pain are not obliged to work during the first two days of their menstrual cycle.
- However, the provision is discretionary. Many employers only permit one day of menstruation leave each month, and some do not grant any leave at all. This could be due to their ignorance of the law or deliberate contempt for it.

### South Korea

- Article 73 of the Labor Law of Korea states: "An employer shall, if requested by a female worker, grant her one day's menstruation leave per month."
- The employer is not required to provide an allowance for the use of the leave, if

requested, by the amended legislation, which now recognizes menstrual time as unpaid leave.

- If both parties agree differently in the labour contract, rules of employment, or collective agreement, the allowance will still be paid.
- Menstruation leave is now regarded as unpaid, however, it is legally allowed to be treated as paid to avoid having an impact on attendance when determining the number of contractual working days and attendance rate for paid holidays, yearly leave, etc.

### Zambia

- The Menstrual Leave Law of Zambia, known as 'Mother's Day', enables women to take one day off work per month freely. If the female employee fails to get leave, she is entitled to file a lawsuit against her employer.

### Taiwan

- "Female employees have the right to request a day off every month for period leave at half their regular wage," according to Article 14 of Taiwan's gender equality in employment law. However, more than these three days leave in the same year are considered as sick leave.

### Vietnam

- Female workers in Vietnam are entitled to a three-day menstrual leave per month, along with a 30-minute break every day during menstruation. Additional compensation is paid to women who choose not to take menstruation leave.
- In India, Bihar is the only state where menstrual leave is applicable. In 1992, after months of struggle, the Lalu Prasad Yadav government granted two days' period leave per month to government employees up to the age of 45.
- In 2017, MP Ninong Ering from Arunachal Pradesh introduced 'The Menstruation Benefits Bill, 2017' in Parliament. Women employed by public and private establishments that were registered with the government would have been entitled to 24 days of leave annually, or two days of period leave each month, under the provisions of the bill. It was, however, withdrawn later.
- Some private employers in India do offer period leave. Zomato offers 10-days annually, Chingari allows for 2 days paid leave per month, Swiggy has 2-days paid monthly leave and Byju's offers 12 days annually.

## 6.7    HUMAN TRAFFICKING

### Context

- The Punjab Police set up a Special Investigation Team on Saturday to probe a suspected human trafficking case

### Human trafficking

- Human trafficking, as defined by the United Nations, involves the recruitment, transportation, transfer, harboring, or receipt of individuals through force, fraud, or coercion for exploitation. This crime manifests in various forms, including forced labor, sexual exploitation, involuntary servitude, or organ harvesting.

### Dimensions of Human Trafficking

1. **Forms of Exploitation:**

#### Sex Trafficking:

- According to the Global Slavery Index 2018, an estimated 4.8 million people are victims of forced sexual exploitation globally.
- Example: The notorious case of underage girls being trafficked for sexual exploitation in the red-light districts of Southeast Asia.

#### Labor Trafficking:

- The International Labor Organization (ILO) estimates that 25 million people globally are in forced labor, with profits exceeding $150 billion per year.
- Example: Migrant workers subjected to exploitative conditions in industries like agriculture, construction, and manufacturing.

## Child Trafficking:

- UNICEF reports indicate that around 1.2 million children are trafficked each year.
- Example: Children forced into bonded labor in India's carpet industry or as child soldiers in conflict zones.

2. **Trafficking Routes and Networks:**
   o According to the U.S. Department of State, human trafficking operates in virtually every country, with trafficking victims originating from and trafficked to various regions.
   o Example: The Mediterranean route, where vulnerable migrants from North Africa are trafficked to Europe, facing exploitation and abuse.

3. **Technology and Human Trafficking:**
   o The UN Office on Drugs and Crime (UNODC) highlights the use of technology, such as social media and online platforms, for recruitment and advertising.
   o Example: Traffickers using encrypted messaging apps for clandestine communication and recruitment.

4. **Cyber-Trafficking:**
   o A study by Europol indicates a rise in cyber-trafficking, facilitated by the anonymity of the dark web.
   o Example: Instances of individuals being bought and sold for sexual exploitation through encrypted online platforms.

5. **Demand-Side Dynamics:**
   o The ILO estimates that 21 million people are in forced labor for private sector gains, including the production of goods consumed globally.
   o Example: Supply chains in the textile industry linked to forced labor in countries like Bangladesh or Uzbekistan.

6. **Victim Identification and Rehabilitation:**
   o The National Crime Records Bureau (NCRB) in India reported a 44% increase in human trafficking cases from 2015 to 2019.
   o Example: NGOs like Anti-Slavery International providing rehabilitation support to victims, including counseling, education, and vocational training.

## Challenges in Combating Human Trafficking

1. **Underreporting and Stigma:**
   o The Polaris Project notes that only a fraction of trafficking cases are reported globally due to fear, lack of awareness, and stigma.
   o Example: Fear of reprisals preventing sex trafficking victims from reporting their exploitation.

2. **Global Supply Chains:**
   o The Walk Free Foundation's Global Slavery Index reveals that forced labor is prevalent in industries like electronics, agriculture, and apparel.
   o Example: Instances of forced labor in the production of electronic goods in East Asia.

3. **Policy Implementation:**
   o The U.S. Department of State's Trafficking in Persons (TIP) Report often highlights gaps in enforcement and implementation of anti-trafficking laws.
   o Example: Challenges in the effective implementation of anti-trafficking policies in certain regions due to corruption and institutional weaknesses.

4. **Migration and Vulnerability:**
   o The International Organization for Migration (IOM) identifies migrants, especially those in irregular situations, as highly vulnerable to trafficking.
   o Example: Vulnerability of Syrian refugees to human trafficking as they seek safety and employment in neighboring countries.

## Status of Human Trafficking in India

1. **Magnitude of the Issue:**
   o The NCRB's Crime in India reports highlight a rising trend in human trafficking cases, with 8,132 cases reported in 2019 compared to 5,544 in 2015.

2. **Vulnerable Groups:**

o Women and children constitute a significant portion of trafficking victims, with instances of forced labor, sexual exploitation, and forced marriages.

3. **Inter-State Variances:**

o There are notable differences in the prevalence of human trafficking across states, emphasizing the need for state-specific interventions.

## Constitutional & Legislative Provisions related to Trafficking in India

1. **Legal Framework:**

o The Immoral Traffic (Prevention) Act, 1956, criminalizes trafficking for commercial sexual exploitation.

o The Bonded Labour System (Abolition) Act, 1976, addresses forced labor and bonded labor.

2. **Amendments and Strengthening:**

o The Criminal Law (Amendment) Act, 2013, introduced stringent provisions to address various forms of trafficking.

o The Trafficking of Persons (Prevention, Protection, and Rehabilitation) Bill, 2018, aims to comprehensively address trafficking issues.

## Related International Conventions

1. **Palermo Protocol:**

o The United Nations Protocol to Prevent, Suppress and Punish Trafficking in Persons, Especially Women and Children (Palermo Protocol) supplements the UN Convention Against Transnational Organized Crime.

2. **ILO Conventions:**

o The International Labour Organization (ILO) has conventions addressing forced labor, child labor, and decent work to combat exploitative labor practices.

3. **SAARC Convention on Preventing and Combating Trafficking in Women and Children:** India has ratified it.

4. **Convention on the Elimination of All Forms of Discrimination Against Women (CEDAW):** India has ratified it.

## Impact of Human Trafficking

1. **Human Rights Violation:**

o Human trafficking is a blatant violation of fundamental human rights, including the right to life, liberty, and security of person.

2. **Economic Consequences:**

o Trafficking undermines economic development by perpetuating cycles of poverty and depriving individuals of fair wages and working conditions.

3. **Public Health Concern:**

o Trafficked individuals often face severe health consequences, including physical and mental health issues, due to exploitation and living conditions.

## Way Forward

### Strengthen Legal Framework:

• Enforce existing laws effectively and consider amendments to address emerging challenges in human trafficking.

### Enhance International Cooperation:

• Collaborate with neighboring countries and international organizations

### Strengthen Border Control and Surveillance:

• Improve border control mechanisms to curb the movement of traffickers and victims across borders.

• Enhance surveillance at transit points and vulnerable areas prone to trafficking.

### Victim-Centric Approach:

• Prioritize the rights and well-being of victims through comprehensive victim support programs.

• Ensure access to legal aid, healthcare, education, and rehabilitation services.

### Training and Capacity Building:

• Provide specialized training for law enforcement agencies, judiciary, and frontline workers to identify and respond effectively to trafficking cases.

• Establish dedicated task forces with the expertise to handle trafficking-related investigations.

### Public Awareness and Education:

• Conduct nationwide campaigns to raise awareness about the various forms of

trafficking, its consequences, and preventive measures.
- Integrate anti-trafficking education into school curricula to empower the younger generation.

### Corporate Accountability:
- Encourage corporate responsibility by promoting ethical business practices and supply chain transparency.
- Penalize businesses found complicit in human trafficking through legal and economic measures.

### Technological Solutions:
- Leverage technology to track and combat online trafficking activities.
- Collaborate with tech companies to develop tools for the identification and reporting of online exploitation.

### Regular Monitoring and Evaluation:
- Establish a robust monitoring and evaluation system to assess the effectiveness of anti-trafficking initiatives.
- Periodically review and update strategies based on evolving trends and challenges.

### International Collaboration:
- Strengthen collaboration with international organizations, such as INTERPOL and the United Nations Office on Drugs and Crime (UNODC), to share intelligence and coordinate efforts.
- Participate actively in regional and global forums to exchange best practices and learn from successful anti-trafficking models.

### Research and Data Collection:
- Invest in research to understand the socio-economic factors contributing to trafficking.

- Develop a comprehensive database to track trends, patterns, and demographics of trafficking for informed policymaking.

### Empowerment Programs:
- Implement socio-economic empowerment programs to address root causes such as poverty, gender inequality, and lack of education.
- Provide skill development and livelihood opportunities to vulnerable populations.

### Legal Aid and Witness Protection:
- Strengthen legal aid services for trafficking victims to facilitate their participation in legal proceedings.
- Implement witness protection programs to ensure the safety and cooperation of victims during investigations and trials.

### Diplomatic Initiatives:
- Engage in diplomatic initiatives to foster international cooperation in addressing trafficking, including joint operations and intelligence sharing.
- Advocate for stronger anti-trafficking measures in global forums.

### Community Involvement:
- Encourage community-based initiatives to prevent trafficking and support survivors.
- Foster community partnerships to create a protective environment against trafficking.

### Early Intervention Programs:
- Implement programs focused on early intervention, targeting vulnerable communities and populations.
- Identify and address risk factors that make individuals susceptible to trafficking.

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## 6.8    PRADHAN MANTRI ANUSUCHITJAATIABHUYDAY YOJANA (PM- AJAY)

### Context
- Information on PM-AJAY Scheme was given by the Minister of State for Social Justice and Empowerment in Rajya Sabha.

### PM-AJAY
#### About
- Pradhan Mantri Anusuchit Jaati Abhuyday Yojana (PM- AJAY) is a merged scheme of 3

Centrally Sponsored Scheme namely Pradhan Mantri Adarsh Gram Yojana (PMAGY), Special Central Assistance to Scheduled Castes Sub Plan ( SCA to SCSP) and Babu Jagjivan Ram Chhatrawas Yojana(BJRCY).

### Implementation
- It has been implemented since 2021-22 to reduce poverty in the SC communities by the generation of additional employment

opportunities through Skill development, income generating schemes and other initiatives and to improve socio-economic developmental indicators by ensuring adequate infrastructure and requisite services in the SC dominated villages.

## Components of the Scheme

- The Scheme has three components:
  1. **Development of SC-dominated villages into an "Adarsh Gram".**
  2. **'Grants-in-aid' for District/State-level Projects for the socio-economic betterment of SCs** that may include the creation of infrastructure in SC-dominated villages including those selected under Adarsh Gram component, construction of Hostels/Residential schools, Comprehensive Livelihood Projects which may include components such as Skill development, related infrastructure development, financial assistance towards loans taken by beneficiaries for acquisition/creation of assets required for livelihood generation etc.
  3. **Construction of Hostels in higher educational institutions** which are top-ranked as per the National Institutional Ranking Framework (NIRF) of the Government of India and are funded by the Centre/State/UT Governments either fully or partially. Similarly, the construction of hostels in schools which are either fully or partially funded by the Centre/State/UT Governments and recommended by the Ministry of Education.

## Objectives of Adarsh Gram Component

- The objective of this component is to ensure integrated development of SC majority villages so that, inter alia, there is:,
- **Adequate infrastructure**: All requisite infrastructure necessary for socio-economic development needs are to be provided under the Scheme.
- **Improvement in Socio-Economic Indicators**. The identified socio-economic indicators, known as Monitorable indicators, are to be

improved so that the disparity between SC and non-SC population is eliminated and the level of indicators is raised to at least that of the National average. More specifically, all BPL SC families should have food and livelihood security, all SC children should complete education at least up to the secondary level, all factors leading to maternal and infant mortality are addressed and the incidence of malnutrition, especially among children and women, is eliminated.

## About Grants-in-aid for District/State-level Projects for Socio-Economic betterment of SCs {erstwhile scheme of Special Central Assistance to Scheduled Caste Sub Plan}

The scheme aims at the socio-economic development of SCs through grants for the following types of projects:

1. Comprehensive Livelihood Projects: Such projects which create an entire eco-system for producing sustainable income, or social advancement to the Scheduled Castes only shall be taken up. The projects should preferably be a combination of two or more of following :
2. **Skill Development**: Skilling courses as per norms of MSDE. Related facilities and infrastructure for conducting Skill Development Activities conducted by the Government. Skill Development Institutions can also be funded.
3. **Grants for creation/acquisition of assets for beneficiaries/households:** There shall be no standalone individual asset distribution under the scheme. However, if project has provision for acquisition/creation of assets for beneficiaries/households needed for livelihood generation, financial assistance towards loans taken by the beneficiary for such acquisition/creation of assets, would be upto Rs.50,000 or 50% of the asset cost, whichever is less, per beneficiary/household.
4. **Infrastructure development:** Development of infrastructure related to the project and also Hostels and residential schools.
5. **Other infrastructure**- Various other infrastructure development projects in SC majority villages.

*Special Provisions:*

- Upto 15% of the total Grants exclusively on viable income-generating economic development schemes/programme for SC Women.
- Upto 30% of the total Grants utilized for infrastructure development
- At least 10% of the total funds for skill development
- Promote SC Women Cooperatives engaged in the production and marketing of consumer goods and services.

## The Achievements during the Financial Year 2022-23:

- Under the Adarsh Gram Component, a total of 1260 villages have been declared as Adarsh Gram during the current FY 2023-24. A total of 09 new hostels have been sanctioned under Hostel component of the scheme.
- Perspective plan for 07 States have been approved under Grant-in-aid component during the current financial year.

## 6.9    SHORT ARTICLES

# Mission Shakti

## Context

- In the first phase, 'Mission Shakti' is being implemented in 7 blocks in 7 districts of Assam and two aspirational districts of Kupwara and Baramulla in UT of J&K.

## Mission Shakti

## About

- Mission Shakti' is a **scheme of the Ministry of Women and Child Development** aimed at strengthening interventions for women safety, security and empowerment.

## Scheme components

- Mission Shakti has two sub-schemes -**Sambal and Samarthya.** The "Sambal" sub-scheme is for safety and security of women and "Samarthya" sub scheme is for empowerment of women.
- In the "Sambal" sub-scheme, the existing scheme of One Stop Centre (OSC), Women Helpline (WHL), Beti Bachao Beti Padhao (BBBP) have been included with modifications and a new component of Nari Adalat - women collective has been added.
- In the "Samarthya" sub scheme, existing schemes of Ujjwala, SwadharGreh and Working Women Hostel have been included with modifications. In addition, the existing schemes of National Creche Scheme and PMMVY under umbrella ICDS have now been included. A new component of Gap Funding for Economic

Empowerment has also been added in the Samarthya Scheme. The existing sub-schemes of Mahila Shakti Kendra (MSK) and Mahila Police Volunteers (MPV) have been discontinued.

## Services and activities

- The scheme will provide financial support for service delivery and for hiring of technical/ other required manpower for the initiatives for immediate and long-term care and support to the targeted women. The services include:
  - **Emergency/ Immediate services &short-term care:** Putting in place mechanisms for providing a continuum of support and care for women affected by violence and women in distress through dedicated 24 hours helpline by a national toll-free number and integrated services such as temporary shelter, legal aid, psycho-social counselling, medical assistance, police facilitation and link them with existing services etc. through One Stop Centres. ii. Institutional
  - **Care for long term support:** The long-term institutional care component, inter alia, includes taking care of the needs of women right from the conception stage till the time they need such care and support because of their physical, financial and sociological status due to various factors. The support system, inter-alia, includes financial support through direct benefit transfer (DBT)

route, shelter, food, rescue & rehabilitation services, counselling, functional literacy, vocational training for skill development, entrepreneurship and linkages with various other support and referral services to destitute, distressed, marginalized, victims of violence, and working women or those who do not have anyone to take care through

- ✓ **Shakti Sadan**, a home for destitute, distressed, marginalized, victims of trafficking, etc. to provide care and support and all the daily needs and services.
- ✓ **SakhiNiwas or Working Women Hostel** will provide a safe and secure place for the working women away from their native place/ homes with all functional facilities like accommodation, food, day-care facility for their children, wherever possible, in urban, semi-urban, or even rural areas where employment opportunities for women exist on nominal cost basis.
- ✓ **The Palna or National Creche component** will provide a safe and secure place for the children of working mothers in the age group of 6 months to 6 years for 71/2 hours a day.
- ✓ Financial support for pregnant and lactating mothers is to improve the health and nutrition for mother and child as well as for partial compensation of wage loss, if any.

- **Behaviour Change Communication for dignity and prevention of crime and violence against women:** This would include large scale awareness programs and community engagement for gender sensitisation, advocacy, training and capacity building of all duty bearers, service providers and stakeholders through inter- ministerial convergence.

# Parliamentary Panel on Child Labor

## Context

- Elimination of child labour is a distant goal, country needs uniform definition of 'child' first: Parliamentary panel

## Parliamentary Panel on Child Labor:

1. **Formation:**
   o The parliamentary panel on child labor would typically be a sub-committee or a specific group formed within the parliamentary structure. Its members may be drawn from various political parties and appointed based on their expertise or interest in addressing child labor issues.

2. **Objective:**
   o The primary objective of such a panel is to examine and address issues related to child labor comprehensively. This includes reviewing existing laws, policies, and implementation mechanisms, as well as proposing recommendations for improvement.

3. **Scope:**
   o The panel would likely have a broad scope, covering aspects such as the prevalence of child labor, enforcement of child labor laws, gaps in the legal framework, and the impact of child labor on education and socio-economic development.

4. **Inquiry and Investigation:**
   o The panel may conduct inquiries and investigations into specific cases of child labor, examining the root causes, identifying responsible parties, and proposing remedial actions.

5. **Consultations:**
   o To gather comprehensive insights, the panel may hold consultations with relevant stakeholders, including government officials, non-governmental organizations, experts in child rights, and representatives from affected communities.

6. **Legislative Recommendations:**
   o Based on its findings, the panel might propose amendments to existing

legislation or recommend the introduction of new laws to strengthen the legal framework for combating child labor.

7. **Policy Review:**
   o The panel could assess the effectiveness of existing policies and programs aimed at eradicating child labor. This includes reviewing initiatives related to education, social welfare, and poverty alleviation.

8. **Awareness and Advocacy:**
   o The panel may engage in awareness campaigns to highlight the consequences of child labor and advocate for policy changes. This can involve public hearings, media interactions, and collaboration with civil society organizations.

9. **International Collaboration:**
   o Given the transnational nature of child labor, the panel may explore opportunities for collaboration with international organizations and other countries to share best practices and coordinate efforts.

10. **Monitoring and Evaluation:**
    o The panel would likely establish mechanisms for ongoing monitoring and evaluation of the implementation of its recommendations. This involves tracking progress, identifying challenges, and making necessary adjustments.

11. **Reporting to Parliament:**
    o Periodic reports and updates on the panel's activities, findings, and recommendations would be presented to the larger parliamentary body. This ensures transparency and allows for parliamentary debate and decision-making.

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## 6.10    1 MAINS & 4 MCQs

*Q1.  In the context of India, critically examine the multifaceted challenges posed by human trafficking. Analyze the existing legal and law enforcement framework, societal factors, and international cooperation in addressing this issue. Propose comprehensive strategies to combat human trafficking and protect the rights of victims, taking into consideration the socio-economic dynamics of the country."*

### Introduction:
- Human trafficking poses a grave challenge in India, impacting individuals across demographics and regions. This multifaceted issue requires a comprehensive understanding, encompassing legal, societal, and international dimensions.

### Legal Framework and Enforcement:
- India has made significant strides in combating human trafficking through legislative measures like the Immoral Traffic (Prevention) Act and the Protection of Children from Sexual Offences Act. However, enforcement remains a challenge due to a lack of resources and coordination. According to the National Crime Records Bureau (NCRB) data, conviction rates remain low, reflecting the gaps in implementation.

### Societal Factors:
- Deep-rooted societal issues contribute to the persistence of human trafficking. Poverty, lack of education, and gender-based discrimination create a vulnerable population. According to UNICEF, around 30% of trafficked victims in India are children, highlighting the urgent need for social interventions to address the root causes.

### International Cooperation:
- Human trafficking is a transnational crime that requires international collaboration. While India has engaged in bilateral and multilateral agreements, more concerted efforts are needed. Strengthening information sharing, intelligence cooperation, and harmonizing legal frameworks across borders can enhance the effectiveness of counter-trafficking initiatives.

### Comprehensive Strategies:
- To address this issue comprehensively, a multi-pronged approach is imperative. This includes bolstering law enforcement

capabilities, increasing awareness through education, and implementing social welfare programs to uplift vulnerable communities. Moreover, victim-centric rehabilitation programs, with a focus on skill development and mental health support, are crucial for their reintegration into society.

**Conclusion:**

- In conclusion, tackling human trafficking in India demands a holistic strategy that addresses legal loopholes, societal vulnerabilities, and fosters international cooperation. The implementation of such a comprehensive approach would not only curb trafficking but also empower and protect the rights of the victims, fostering a more resilient and just society.

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*Q2. The Protection of Women from Sexual Harassment at Workplace Act, 2013, mandates certain obligations for employers.*

**Which of the following statements regarding the Act is correct?**

A) The Act applies only to large corporate organizations.
B) Employers are not required to constitute Internal Complaints Committees (ICCs).
C) The Act covers harassment both within and outside the workplace.
D) Complaints under the Act can only be filed by permanent employees.

*Q3. Naya Savera Scheme, a nuanced initiative, pertains to which specific socio-economic domain, focusing on targeted empowerment?*

A) Microfinance for women entrepreneurs
B) Technology-driven agricultural advancements
C) Skill development for minority youth

D) Indigenous healthcare infrastructure

*Q4. The Palermo Protocol, frequently referenced in international discussions, is associated with:*

A) Conservation of cultural heritage sites
B) Combating human trafficking, especially women and children
C) International climate change agreements
D) Preservation of marine biodiversity

*Q5. Under the United Nations protocol to combat human trafficking, what is the specific term used for the recruitment, transportation, transfer, harboring, or receipt of persons using threat, use of force, or other forms of coercion for the purpose of exploitation?*

A) Smuggling
B) Kidnapping
C) Trafficking in Persons
D) Forced Migration

**ANSWERS: 2) C, 3) C, 4) B, 5) C**

# 7. SCIENCE & TECHNOLOGY AND HEALTH

## 7.1    CRITICAL MINERALS

### Context

- The Ministry of Mines, will be launching the first tranche auction of critical and strategic minerals here on 29th November, 2023.

### Details

- As Chief Guest, Union Minister of Coal, Mines, and Parliamentary Affairs, Shri Pralhad Joshi will be launching the first-ever critical minerals auction process.
- Twenty blocks of critical and strategic minerals being auctioned are spread across the country.



- This is a landmark initiative that will boost our economy, enhance national security, and support our transition to a clean energy future.

### About Critical minerals

*The Government had specified royalty rates for Platinum Group of Metals (PGM) at 4%, Molybdenum at 7.5%, and Glauconite and Potash at 2.5% in March 2022. On 12th October, 2023 the Government specified royalty rates for Lithium at 3%, Niobium at 3%, and Rare Earth Elements at 1%.*

- **Critical and Strategic Minerals are in high demand and the same is usually met by imports**. Critical minerals cater to the needs of sectors like renewable energy, defense, agriculture, pharmaceutical, high-tech electronics, telecommunications, transport, creation of gigafactories, etc.
- **Critical minerals are essential for our country's economic development** and national security. The lack of availability of these minerals or the concentration of their extraction or processing in a few countries may lead to supply chain vulnerabilities.
- **The future global economy will be underpinned by technologies** that depend on minerals such as *lithium, graphite, cobalt, titanium, and rare earth elements (REE).*

*India has committed to achieve 50% of cumulative electric power installed capacity from non-fossil sources by 2030.*

- Such an ambitious plan for energy transition is **set to drive the demand for electric cars, wind and solar energy** projects, and battery storage systems thereby increasing the demand for these critical minerals.

## Importance and Need of Critical Minerals

### Technological Advancements:

- Critical minerals are essential components in the manufacturing of **advanced technologies, including electronics, renewable energy systems, electric vehicles, and telecommunications**. They are used in the production of **smartphones, batteries, solar panels, and other high-tech devices.**

### Clean Energy Transition:

- **Many critical minerals are vital for the development and deployment** of clean energy technologies. For example, minerals **like lithium, cobalt, and rare earth elements are crucial for the production of batteries** used in electric vehicles and energy storage systems, contributing to the transition to clean and sustainable energy sources.

### National Security:

- Access to a stable and diversified supply of critical minerals is considered a matter of national security for many countries. **Dependence on a limited number of suppliers or facing disruptions** in the supply chain can have significant geopolitical and economic implications.

### Economic Growth:

- The extraction, processing, and utilization of critical minerals contribute significantly to national and global economies. **Industries relying on these minerals generate jobs, foster innovation, and stimulate economic growth**.

### Global Supply Chain Resilience:

- Ensuring a resilient and diversified global supply chain for critical minerals is crucial for minimizing the impact of **geopolitical tensions, trade disputes, or disruptions caused by natural disasters**. A robust supply chain helps maintain stability in industries that rely on these minerals.

### Strategic Industries:

- Critical minerals are fundamental to various strategic industries, including defense, aerospace, healthcare, and telecommunications. They are used in the manufacturing of **advanced materials, components, and equipment critical for the functioning of these industries.**

### Innovation and Research:

- Critical minerals often serve as catalysts or components in research and innovation. They enable the development of **cutting-edge technologies, medical advancements, and materials with unique properties that drive scientific progress.**

### Environmental Technologies:

- Many critical minerals contribute to the development of environmental technologies. **For instance, rare earth elements are used in the production of efficient lighting, wind turbines, and catalyst**s for emissions control, supporting efforts to address environmental challenges.
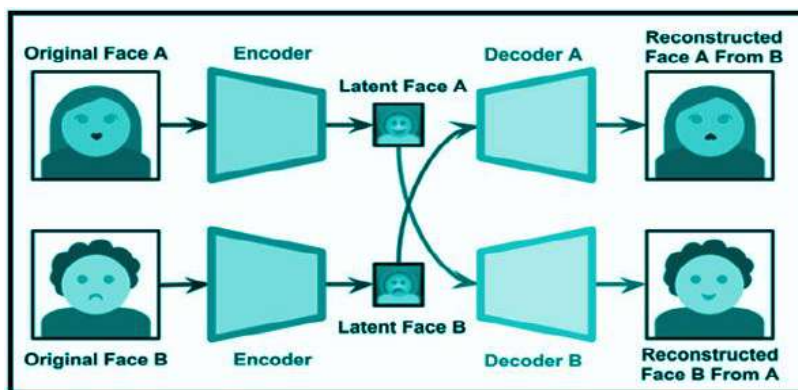
## 7.2    REGULATING DEEP FAKES

### Context

- The middle has introduced draft regulations, to cope with the difficulty of deep fakes.

### Details

- Last month a video featuring actor Rashmika Mandanna went viral on social media, sparking a combination of shock and horror

among netizens.

- The seconds-long clip, which featured Mandanna's likeness, showed a woman entering a lift in a bodysuit. The original video was of a British Indian influencer named Zara Patel, which was manipulated using deepfake technology.
- Soon after, the actor took to social media to express her dismay, writing, "*__Something like this is honestly, extremely scary not only for me but also for each one of us who today is vulnerable to so much harm because of how technology is being misused.__*".

## About Deep Fakes

*Deep Fakes refer to manipulated digital media, including videos, audio, and images, created using artificial intelligence (AI) algorithms. These sophisticated forgeries often appear hyper-realistic and can have significant implications for various sectors.*

- __Deepfakes are digital media —__ video, audio, and images edited and manipulated using Artificial Intelligence (AI).
- Since they incorporate hyper-realistic digital falsification, they can potentially be used to damage reputations, fabricate evidence, and undermine trust in democratic institutions.
- This phenomenon has forayed into political messaging as well, a serious concern in the run-up to the general elections next year.

## Concerns Surrounding Deep Fakes

### Spread of Misinformation and Propaganda:

- Deep fake videos can be exploited to disseminate false information and propaganda, eroding trust in media and democratic institutions.

### Violence Against Women:

- A rising concern is the use of deep fakes for technology-based sexual violence online. Studies, such as the **Deeptrace AI study in 2019**, revealed that a majority **(96%) of deep fakes were pornographic, with 99% featuring women.**

### Security Risks and Phishing Attacks:

- Cybercriminals can leverage Deep Face technology for phishing attacks, making it challenging for individuals to discern between authentic and manipulated communications, posing a significant security risk.

### Political Manipulation:

- Deep fakes have the **potential to create misleading content, particularly in political campaigns**, influencing public perception and potentially impacting the outcome of elections.

### Identity Theft:

- Deep fakes can be exploited for identity theft, wherein an **individual's voice or face** is manipulated to create fake audio or video recordings for malicious purposes, such as impersonation or fraud.

## Existing Legal Framework in India for Deep Fake and AI-Related Crimes

India currently lacks specific legislation addressing deep fake and AI-related crimes; however, various provisions within existing laws offer both civil and criminal remedies.

### Information Technology Act, 2000 (IT Act):

- *Section 66E:* This section pertains to deep fake offenses, encompassing the capture, publication, or transmission of images violating an individual's privacy in the media.
- *Section 66D*: Targets individuals using communication facilities or computer resources for malicious purposes, leading to impersonation or fraud.

### Information Technology Act, Sections 67, 67A, and 67B:

- These sections empower legal action against individuals publishing or transmitting indecent or sexually explicit deep fake content.

### Information Technology Rules:

- **Prohibit the hosting of "fake content"** and mandate social media platforms to promptly remove "artificially manipulated images" upon reporting. Failure to comply risks the loss of "safe harbor" protections, shielding platforms from regulatory liability.

**Indian Penal Code, 1860 (IPC):**

- *Section 509:* Addresses words, gestures, or acts intended to outrage the modesty of a woman.
- *Section 499*: Pertains to criminal defamation.
- *Sections 153(a) and (b):*Deal with spreading hatred in society. These sections may be invoked in cases of deep fake-related cybercrimes.

**Copyright Act, 1957:**

- *Section 51:* Prohibits the unauthorized use of property belonging to another person, where the owner holds exclusive rights.

**Way Ahead**

- **Governance of AI in India cannot be limited tolaw alone**, and reforms must focus on strengthening safety standards, raising awareness, and building institutions.
- **India's regulatory response should be shaped** with a young and thriving ecosystem in mind.
- Nor should freedom of expression be curtailed under the guise of regulatory artificial intelligence technology.
- **The benefits of AI must be addressed** in a way that improves human well-being by all means and limits the challenges it brings.

## 7.3  ORGAN DONATION IN INDIA

### Context

- Organ donations and transplants in exchange for money are forbidden in India to protect poor and vulnerable donors from potential exploitation.

### Details

- The government has ordered a probe into the findings of an investigation by The Telegraph published earlier this month, alleging that poor Myanmarese villagers were being lured into giving their kidneys to rich patients from that country, with the involvement of Delhi's Apollo hospital.
- Organ donations and transplants in exchange for money are forbidden in India to protect poor and vulnerable donors from potential exploitation.

### Facts related to Organ transplantation

*According to data accessed from the Health Ministry, the number of organ transplants has increased by over three times from 4,990 in 2013 to 15,561 in 2022.*

- Of the 15,561 transplants, a majority — 12,791 (82%) — are from live donors, and 2,765 (18%) are from cadavers (the dead).
- Up to 11,423 of the 15,561 organ transplants are for the kidney, followed by liver (766), heart (250), lung (138), pancreas (24) and small bowel transplants (3).

- Most of these transplants occur in private hospitals, the numbers in government hospitals are relatively lower.

### Types of Organs

- Deceased donors have the potential to donate six life-saving organs: **kidneys, liver, heart, lungs, pancreas, and intestine.**
- Additionally, **uterus transplants are performed**, although the uterus is not considered a life-saving organ.

**1. Legal Considerations:**

- Organs and tissues from an individual declared legally dead can be donated, contingent on obtaining consent from the family.
- **Brainstem death is acknowledged** as a form of death in India, aligning with international standards.

**2. Donation After Natural Cardiac Death:**

- **Following a natural cardiac death**, organs available for donation include cornea, bone, skin, and blood vessels.
- After brainstem death, a comprehensive range of about **37 organs and tissues,** including the six life-saving organs, can be donated.

### Living Organ Donations

- Distinct from deceased donations, living donors play a vital role in contributing to the

organ pool. Here are the specifics related to living organ donations:

## 1. Permissible Donations:
- Living donors are authorized to donate specific organs:
- One of their kidneys
- A portion of the pancreas
- Part of the liver

## 2. Age and Recipient Relations:
- **Living donors must be over 18 years old.**
- Donations are generally limited to immediate blood relatives; however, exceptions are made in special cases driven by affection and attachment towards the recipient.

## Organ Donation in India
- The **Transplantation of Human Organs Act of 1994** provides several laws for the removal and preservation of human organs. Additionally, it controls the transplantation of human organs for medical treatment and prohibits the sale of human organs.

- **The rate of organ donation in India is 0.52 per million people**. The greatest organ donation rate in the world, in contrast, is 49.6 per million people in Spain.
- **Spain has an opt-out system whereby a person is assumed** to be a donor unless otherwise specified, in contrast to India, where a person must register to be an organ donor and the family must consent to it after death.
- Despite the rise in organ donation, the **proportion of donations from the deceased** has remained lower than that from the living. Organs donated by the family members of those who had cardiac or brain death are known as deceased donations.
- **There is a regional imbalance in deceased donors**. The top five states, Telangana, Tamil Nadu, Maharashtra, Gujarat, and Karnataka, accounted for more than 85% of all dead organ donations in 2021.

## 7.4    LUMPY SKIN DISEASE

## Context
- Questioning the Union Animal Husbandry Ministry's data that more than two lakh cattle and buffaloes had died by lumpy skin disease (LSD) in 2022 and 2023.

## Details
- The Parliamentary Standing Committee on Agriculture, Animal Husbandry and Food Processing, headed by BJP MP P.C. Gaddigoudar, said there was a gap/mismatch in the number of cattle affected and dead, and the actual ground realities.
- Though the Ministry argued otherwise, the panel said accurate data would have helped in understanding the gravity of the situation, and in controlling and containing the disease.
- The panel recommended that the Centre ensure proper compilation of data on the spread of infection and mortality of cattle from LSD so that cases of infection and mortality do not remain unreported and under-reported.

## Key points about Lumpy skin disease (LSD)
### About
- Lumpy Skin Disease (LSD) is a **highly infectious viral disease** affecting cattle.
- Caused by the **lumpy skin disease virus (LSDV),** a member of the **capripoxvirus genus within the poxviridae family**, LSD poses economic threats to the livestock industry.

### Causative Agent
- **LSDV, a non-zoonotic virus**, is specific to cattle and does not pose a risk to human health. Belonging to the poxviridae family, LSDV shares its family with notorious viruses such as **smallpox and monkeypox.**

## Symptoms

- **Cutaneous Nodules**: Enlarged lymph nodes manifest as lumps on the skin, particularly on the head, neck, limbs, udder, genitalia, and perineum.
- **Ulcers and Scabs**: Nodules progress into ulcers, eventually developing scabs over the skin.
- **Systemic Symptoms**: High fever, reduced milk yield, eye and nose discharge, salivation, loss of appetite, depression, damaged hides, emaciation, infertility, and abortions.
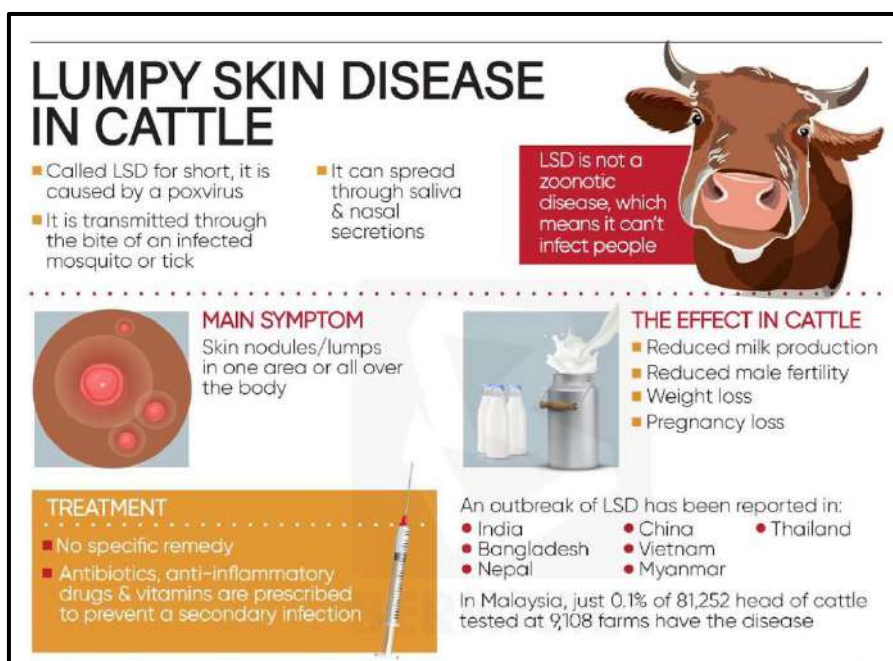


## Transmission

- **Insect Vectors**: Spread by blood-feeding insects, including certain flies, mosquitoes, and ticks.
- **Animal Movement**: Transmission through the movement of affected animals.
- **Contaminated Equipment**: Spread through equipment contaminated by infected animals.
- **Direct Animal-to-Animal Contact:** Direct transmission between animals in some cases.

## Treatment

- **Supportive Care**: No direct antiviral treatment is available. Infected animals receive supportive care, including antibiotics, painkillers, and wound care sprays to manage symptoms.
- **Vaccination:** Vaccines play a crucial role in controlling disease transmission, serving as a preventive measure.

## Economic Impact

- LSD can result in a temporary reduction in milk production, temporary or permanent sterility in bulls, damage to hides, and, in severe cases, death. The disease holds economic significance, necessitating strategic control measures within the livestock industry.

## Mortality Rates and Incubation Period:

- **Incubation period**: Around 28 days (FAO) or 4 to 14 days (other estimates).
- **Morbidity:** Varies between 2 to 45%.
- **Mortality:** Less than 10%, but reported up to 15% in the recent Indian outbreak, especially in Rajasthan.

## Geographical Distribution and Spread to India:

- **Origin:** First observed in Zambia in 1929.
- **Spread:** Africa, West Asia, Southeastern Europe, Central Asia, and South Asia (2019).
- **Current Endemic Areas:** Africa, parts of West Asia, Turkey.
- **Spread to India**: Reached Odisha and West Bengal in August 2019, likely facilitated by porous borders and informal animal trade.

## Safety of Consuming Milk:

- Studies suggest no viable and infectious LSDV virus in milk.
- Milk processing methods (pasteurization, boiling, drying) ensure virus inactivation or destruction.

**Economic Implications on the Dairy Sector:**

- **Milk Reduction**: LSD leads to decreased production due to weakened animals.
- **Animal Wasting**: Poor growth, reduced draught power, reproductive problems.
- **Impact of Trade Ban**: Movement and trade bans strain the entire value chain.

## Why India is at Higher Risk

- World's largest milk producer (210 million tonnes annually).
- Largest headcount of bovines.
- Impact in Rajasthan led to reduced milk production and economic strain on farmers.

### Current Spread in India:

- Over 16 lakh cattle infected in 197 districts (as of September 11).
- Over 50,000 deaths were reported, mostly in Rajasthan.

### Remedies in India

- **'Goat Pox Vaccine'** effective against LSD, used to contain the spread.
- Ministry of Fisheries, Animal Husbandry, and Dairying implementing control measures.

### Control Measures Proposed by FAO

- Vaccination with over 80% coverage.
- Movement control and quarantining.
- Biosecurity measures, including vector control.
- Strengthening surveillance.
- Awareness campaigns.
- Establishing protection and surveillance zones.

## 7.5    PESTICIDE HAZARD

## Context

- Recently, in Maharashtra which is prone to droughts and crop failures, pesticide poisoning has claimed the lives of many farmers and farm workers in recent years.

## Details

- 20 farmers have died due to pesticide poisoning in Yavatmal district alone since 2017.
- Many others have suffered from respiratory problems, skin rashes, eye irritation, neurological disorders, reproductive issues, cancer, and even death.

## About Pesticides

### About

- Pesticide is any **chemical or biological substance** intended to prevent, destroy or control damage from pests which has **both agricultural and non-agricultural uses**.
- They also pose serious risks to human health and the environment, especially when they are misused, overused, or sold illegally.

### Types

- **Insecticides:** Designed to protect plants from insects and pests.
- **Fungicides:** Used to control the spread of fungal diseases in plants.
- **Herbicides:** Kill or control the growth of weeds in cultivation areas.
- **Bio-Pesticides:** Derived from biological sources like animals, plants, and bacteria.
- **Other Categories:** Include plant growth regulators, nematicides, rodenticides, and fumigants.

## Pesticide poisoning

- **Pesticide poisoning** refers to the adverse effects of pesticide exposure on humans or animals. The World Health Organization (WHO) identifies it as a leading cause of death among agricultural workers globally. **Pesticide poisoning can be categorized into two types: acute (short-term) and chronic (long-term).**
- **Acute Poisoning**: Occurs when an individual is exposed to a significant amount of pesticide through ingestion, inhalation, or contact within a brief timeframe.
- **Chronic Poisoning**: Results from prolonged exposure to low doses of pesticides, leading to organ and systemic damage over an extended period.

## Recent Banned Pesticides (2023)

- The government took action in 2023, prohibiting the use of three additional insecticides—**Dicofol, Dinocap, and Methomyl**—joining the previously banned monocrotophos.
- This step was taken to address the potential risks associated with these substances and enhance overall safety in pesticide usage.



**PESTICIDE CONSUMPTION IN INDIA**

1. India is the **leading producer of pesticides** in Asia
2. Nearly **9 lakh tonne** of agrochemicals are produced annually; over **50% of the total production is** exported every year
3. Top two crops for which pesticides are used: **Paddy (26%-28%) & Cotton (18%-20%)**
4. Top consumer of chemical pesticides: **Andhra Pradesh — 24%** of total consumption
5. Eight states account for over 70% usage of agrochemicals in India — Andhra Pradesh, Maharashtra, Punjab, Madhya Pradesh, Chhattisgarh, Gujarat, Tamil Nadu and Haryana

## Regulation of Pesticides in India

### Legal Framework:

- Pesticides in India are governed by the **Insecticides Act, 1968,** and the Insecticides Rules, 1971. Administered by the **Department of Agriculture and Farmers Welfare** under the Ministry of Agriculture and Farmers Welfare, this legislation oversees the **registration, manufacture, and sale of pesticides.**

### Proposed Legislation:

- The **Pesticide Management Bill, 2020**, presented in the Rajya Sabha, aims to replace the Insecticides Act, 1968. This bill seeks to comprehensively regulate the entire lifecycle of pesticides to ensure safety and minimize risks to **humans, animals, and the environment.**

## Concerns Surrounding Pesticide Usage

### Impact on Farmers:

- Experts highlight concerns about **chronic low-level pesticide exposure** leading to various nervous system symptoms, including headache, fatigue, and serious conditions like **Parkinson's and Alzheimer's diseases.**

### Consumer Risks:

- Pesticides enter the food chain through bio magnification, posing risks to human health. They traverse through the **environment, soil, water systems**, and ultimately into plants and animals consumed by humans.
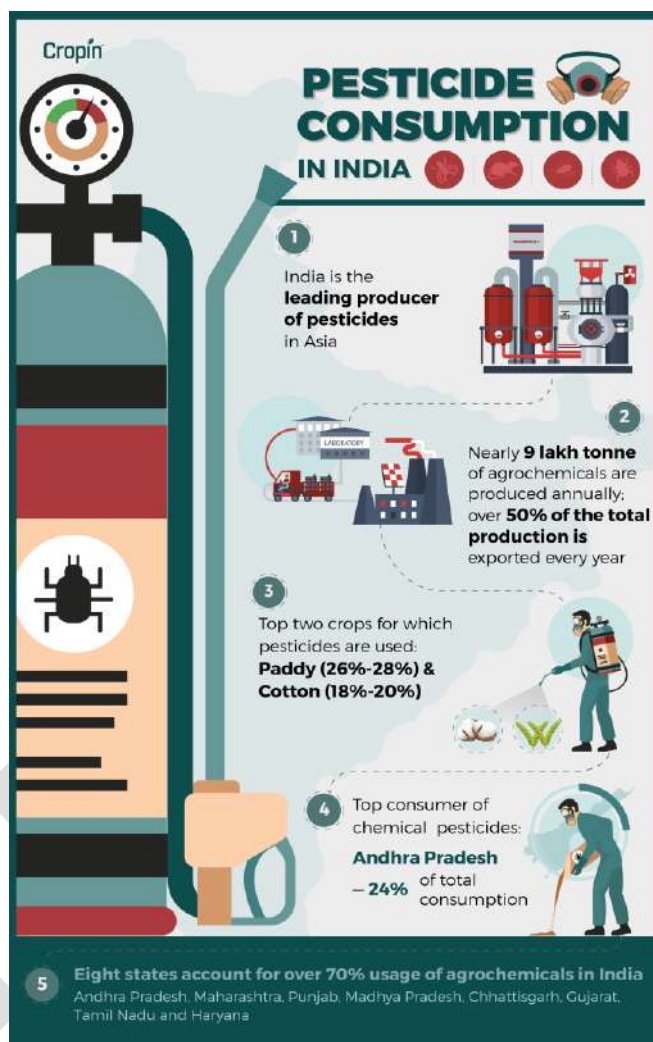
## Agricultural Consequences:

- Decades of pesticide use have contributed to ecological, economic, and existential crises in the **Indian agriculture sector**. The continued use of certain pesticides raises environmental and sustainability challenges.

## Regulatory Challenges:

- The Insecticides Act, being a central legislation, limits the direct involvement of state governments. This has resulted in the **approval of over 100 pesticides** in India that have been banned in multiple countries, raising concerns about regulatory effectiveness.

## Global Perspectives:

- In 2021, **PAN International identified over 100 highly hazardous** pesticides approved for use in India, emphasizing the need for a critical review of pesticide regulations.

## Moving Forward: Strategies for Improvement

### Regulatory Reforms:

- Enforce regulations rigorously to curb illegal sales and misuse of pesticides. Establish penalties for violations, ensuring a deterrent effect.

### Government Support:

- Provide financial support to farmers for adopting safer and sustainable agricultural practices. Explore subsidies for organic farming, **integrated pest management**, or the use of safer pesticides.

### Community Awareness Programs:

- Initiate community-level awareness campaigns to educate people about the risks associated with pesticide use. Involve local communities in monitoring and **reporting misuse or poisoning cases.**

### Compensation Mechanism:

- Establish a transparent and swift compensation mechanism for victims of pesticide poisoning. Streamline the process for **filing claims and ensure compensation** covers medical expenses and economic losses.

## 7.6    SHORT ARTICLES

# White Lung Syndrome

## Context

- After the outbreak of mystery pneumonia among China's pediatric population, a similar illness has been raising child hospitalization cases in Ohio, US.

## Details

- **A respiratory illness known as White Lung Syndrome is affecting children in both China and the United States**. The illness is characterized by white patches on the lungs and symptoms such as cough, fever, fatigue, and, in younger children, sneezing, runny nose, watery eyes, wheezing, vomiting, and diarrhea.
- **Health officials believe the illness is caused by a combination** of existing viruses and bacteria, including COVID-19, influenza, RSV, and mycoplasma.

- Experts **recommend getting children vaccinated against preventable respiratory illnesses** and maintaining a healthy lifestyle with a balanced diet, physical activity, and good sleep to prevent the illness.

## About White Lung Syndrome:

### About

- White lung syndrome, also known as white lung pneumonia, is a respiratory infection characterized by the presence of white patches in the lungs.

### Origin

- White lung syndrome gained attention in **China** and has recently been reported in **Ohio, U.S**., particularly among paediatric populations.

### Causing agents

- **The term is used to describe a sudden outbreak of pneumonia** caused by multiple

microorganisms, including influenza, SARS-CoV-2 (Covid-19), Respiratory syncytial virus (RSV), and mycoplasma pneumonia.

## Symptoms

- **Upper Respiratory Symptoms**: Sneezing, stuffy or runny nose, watery eyes.
- **Lower Respiratory Symptoms**: Cough, fever, fatigue, wheezing, shortness of breath, development of pneumonia.
- **Other Symptoms**: Sore throat, skin rash, diarrhea, vomiting.

## Diagnosis and Treatments

- **Diagnosis is based on clinical symptoms**, medical history, physical examination, and chest imaging (X-ray or CT scan).

- **Treatment depends on the underlying cause and severity** and may include antibiotics, antivirals, oxygen therapy, mechanical ventilation, steroids, immune-suppressants, fluids, and electrolytes.

## Preventive measures

- **Vaccination**: Emphasizes the importance of vaccination for preventing outbreaks, including influenza and other respiratory infections.
- **Healthy Lifestyle**: Encourages a balanced diet, regular physical activity, and good quality sleep.
- **Personal Hygiene**: Promotes regular handwashing, covering the mouth and nose when coughing or sneezing.

# XPoSat Mission

## Context

- The launch of India's first X-ray Polarimeter Satellite (XPoSat) by the Indian Space Research Organisation (ISRO) marks a significant milestone in the country's space exploration endeavors, particularly in the realm of X-ray astronomy.

## About XPoSat Mission:

- XPoSat is a dedicated Indian **polarimetry mission to study various dynamics of astronomical sources** in extreme conditions. It works in medium energy band and long-



duration spectroscopic observation in soft energy X-ray band. The mission will help to understand the emission mechanism from a variety of X-ray sources.

- **Objective**: XPoSat aims to explore and measure the polarization of intense X-ray sources in the energy band of 8-30 keV.
- **Comprehensive Studies**: The mission conducts simultaneous observations of temporal, spectral, and polarization features of bright X-ray sources.
- **Observation Period:** XPoSat observes X-ray sources during its transit through the Earth's shadow (eclipse period).

## Payloads:

## POLIX (Polarimeter Instrument in X-rays):

- **Function**: Measures polarimetry parameters (degree and angle of polarization) in the medium X-ray energy range of 8-30 keV from astronomical sources.
- **Development**: Designed by the Raman Research Institute (RRI), Bengaluru, with support from various ISRO centers.

## XSPECT (X-ray Spectroscopy and Timing):

- **Function**: Provides spectroscopic information within the energy range of 0.8-15 keV.
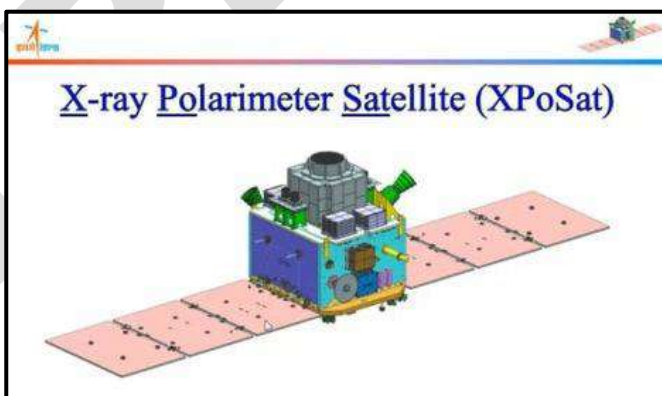
- **Development**: Developed by the U.R. Rao Satellite Centre (URSC), ISRO.

**Orbit and Duration:**

- **Orbit**: Operates from a Low Earth Orbit (non-sun synchronous orbit of approximately 650 km altitude and low inclination of around six degrees).
- **Mission Life**: Expected to be approximately five years.

**Significance of XPoSat Mission:**

**Advancing X-ray Astronomy:**

- XPoSat adds a novel dimension to X-ray astronomy studies in India, supplementing existing imaging, time-domain studies, and spectroscopy.

**Scientific Anticipation:**

- Generates excitement within the scientific community due to its potential to provide valuable insights into the nature and behavior of cosmic X-ray sources.

# X-Ray Polarimeter Satellite

**Context**

- The spacecraft is planned to be launched in 2021 but due to the Chinese Wuhan virus pandemic the launch may get delayed.

**About X-ray Polarimeter Satellite:**

- **It is a branch of astronomy that focuses on measuring and analyzing the polarization of X-ray photons** emitted by celestial objects.

- **It aims to understand the physical properties** of high-energy



astrophysical sources, such as **black holes,** neutron stars, pulsars, and active **galactic nuclei (AGN),** by studying the polarization characteristics of X-ray emissions.
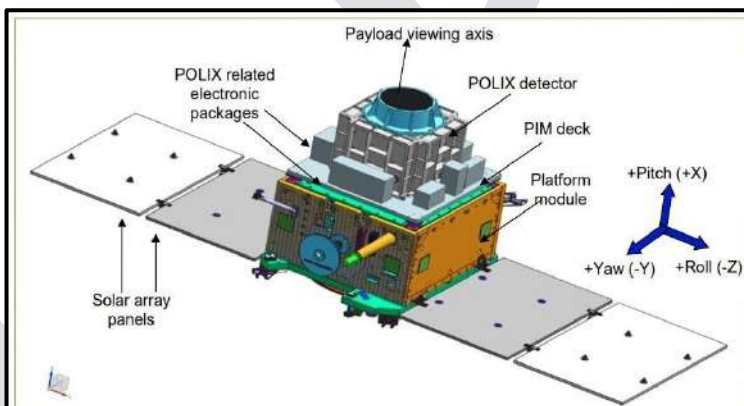
**Basics of Polarimetry:**

- **Polarization**:
  o Refers to the orientation of oscillation of electromagnetic waves.
  o In X-rays, polarization describes the direction in which the electric field associated with the X-ray wave oscillates.
- **Polarimetry Instruments:**
  o Specialized instruments designed to detect and measure the polarization state of X-ray photons.
  o Use devices such as gratings, analyzers, or other technologies capable of discerning the polarization of X-rays.

**Significance:**

**Revealing Astrophysical Phenomena:**

- Helps unravel mysteries of various astrophysical objects and phenomena, providing unique information not obtainable through traditional imaging or spectroscopy alone.

**Probing Magnetic Fields:**

- Polarized X-rays carry information about the magnetic fields present in celestial objects, aiding in understanding their geometry and strength.

**Investigating Emission Mechanisms:**

- Aids in identifying emission mechanisms in high-energy astrophysical sources, shedding light on particle acceleration and radiation processes.

# AMRIT Technology

## Context

- Recently, the Indian Institute of Technology, Madras has developed a technology called 'AMRIT' (Arsenic and Metal Removal by Indian Technology) technology.

## Details about Amrit Technology:

### Arsenic and Metal Ion Removal

- **In the realm of water purification, groundbreaking technology** has emerged to address the critical issue of arsenic and metal ion contamination.
- **Leveraging nano-scale iron oxy-hydroxide**, this cutting-edge method offers a selective and efficient means of removing arsenic when water passes through it.

### Dual Application: Domestic and Community Levels

- **This advanced water purifier is not confined to household use alone**; it is designed to cater to both domestic and community levels.
- Whether for individual homes or larger communal water sources, the technology stands as a versatile solution to combat arsenic and metal ion presence in water.

### Endorsement by the Department of Drinking Water and Sanitation

- The efficacy of this technology has earned it a notable recommendation from the former **'Standing Committee' of the Department of Drinking Water and Sanitation.**
- Acknowledged for its prowess in water and sanitation technologies, the committee has advocated for a thorough examination of this innovative solution.

## Key points about Arsenic:

### About

- Arsenic is a naturally occurring chemical element with the **symbol 'As' and atomic number 33.**
- It is **commonly found in the Earth's crust** and can be present in various forms, including inorganic and organic compounds.

### Physical Properties

- Arsenic is a gray, **metallic-looking solid at room temperature** and has a metallic luster.
- It can exist in various forms: **yellow, black, and gray arsenic**. The yellow form is the most unstable.

### Chemical Properties

- Arsenic reacts with oxygen and water but **doesn't dissolve in non-oxidizing acids**.
- It forms various compounds, both organic and inorganic, with different chemical behaviors.

### Occurrence

- Found naturally in soil, rocks, water, air, and living organisms.
- Commonly occurs in combination with other elements like sulfur, oxygen, and metals, especially in minerals.

### Applications

- **Semiconductor industry**: Arsenic is used in the production of semiconductors, gallium arsenide-based electronics, and solar cells.
- **Pharmaceuticals:** Arsenic compounds have been explored in medical treatments, particularly in some cancer treatments.

- **Agriculture:** Formerly used in pesticides and herbicides, but its use has been largely restricted due to its toxicity.

# Meftal & DRESS Syndrome

## Context

- The Indian Pharmacopoeia Commission (IPC) has alerted about mefenamic acid (Meftal), a commonly used painkiller.

## Details:

- Drug Reaction with Eosinophilia and Systemic Symptoms (DRESS) Syndrome is a severe and potentially life-threatening hypersensitivity reaction that can occur as a response to various medications.

## About DRESS Syndrome:

### Onset and Symptoms

- Symptoms typically appear around 2 to 8 weeks after starting the medication.
- Symptoms include fever, rash (morbilliform rash - measles-like), facial swelling, and lymph node enlargement.
- Besides skin symptoms, **organs like the liver, lungs, or kidneys can be affected**, leading to more severe complications.

### Causes

- **DRESS Syndrome can be triggered by a wide array of drugs**, although some medications are more commonly associated, including antiepileptic drugs, antibiotics, allopurinol (used for gout), and NSAIDs (like Mefenamic acid).
- Unlike immediate allergic reactions, **symptoms of DRESS Syndrome appear after a few weeks of initiating the drug.**

### Diagnosis

- Diagnosis is based on clinical symptoms and a temporal association with starting a new medication.
- Eosinophilia (an increase in a type of white blood cells called eosinophils) and abnormal liver or kidney function tests might be observed.

### Treatment of DRESS Syndrome

- The primary and crucial step in managing DRESS Syndrome is **stopping the medication responsible for the reaction.**
- Depending on the severity, organ involvement might require specialized care.
- Topical steroids for skin involvement and systemic steroids (oral or intravenous) might be needed in severe cases to dampen the immune response.
- Close monitoring of organ function and blood tests during and after treatment is essential.

*IPC is an **Autonomous Institution of the Ministry of Health and Family Welfare** that sets standards for drugs in the country. It regularly releases updates on the standards of commonly used drugs.*

# Use of mRNA as medicine

## Context

- The cells in our body create mRNAs that serve as instructions to make specific proteins we need to function. Researchers can create new mRNAs to correct those instructions when they aren't working.

## What does mRNA do?

- *Messenger RNA (mRNA) plays a pivotal role in conveying **genetic instructions from the DNA library** to the cellular machinery, dictating the **synthesis of essential proteins**. This intricate process can be likened to a library of cookbooks (DNA) containing recipes (genes) for diverse proteins.*

### Protein Orchestra in the Body:

- Our bodies require approximately 100,000 proteins to execute various functions, from breaking down food to facilitating vital chemical reactions. Each protein corresponds to a unique recipe within the DNA library.

## mRNA: The Copycat Messenger:

- When a cell needs a specific protein, it doesn't directly read the recipe from DNA. Instead, it crafts a copy known as mRNA. This mRNA serves as a messenger, carrying the precise instructions for protein synthesis.



**How mRNA Vaccines Work**
The vaccine spurs healthy cells to produce viral proteins that stimulate a potent immune response

Sources: Pfizer, Bloomberg research — Bloomberg

### The Alphabet of mRNA:

- mRNA is composed of four building blocks—A (adenine), U (uracil), C (cytosine), and G (guanine)—forming words consisting of only three letters. This abbreviated language guides the cellular machinery in creating the required protein.

### Reading the mRNA Recipe:

- Cells proficiently read the mRNA recipe to decipher the protein-making instructions. The three-letter words act as a code, facilitating a seamless translation of genetic information into functional proteins.

### Lifecycle of mRNA:

- Cells demonstrate efficiency in recognizing, utilizing, and disposing of mRNA once its role is fulfilled. This streamlined process ensures that protein synthesis is precisely regulated, contributing to cellular homeostasis.

### DNA Mutations: Culprits of Protein Errors:

- Alterations or mistakes in the DNA's recipe book, known as mutations, can disrupt mRNA instructions. These errors in protein synthesis have the potential to cause diseases, underscoring the critical importance of genetic integrity.

# PACE Mission

### Context

- NASA is gearing up for the launch of the PACE (Plankton, Aerosol, Cloud, ocean Ecosystem) mission in 2024. The mission's objective is to enhance the understanding of Earth's atmosphere.

### Details:

### What are aerosols?

- These include tiny particles like smoke, dust, and pollutants that may seem inconspicuous, but they play a crucial role in influencing our climate.Aerosols absorb and scatter sunlight, determining the amount of solar energy reaching Earth's surface.
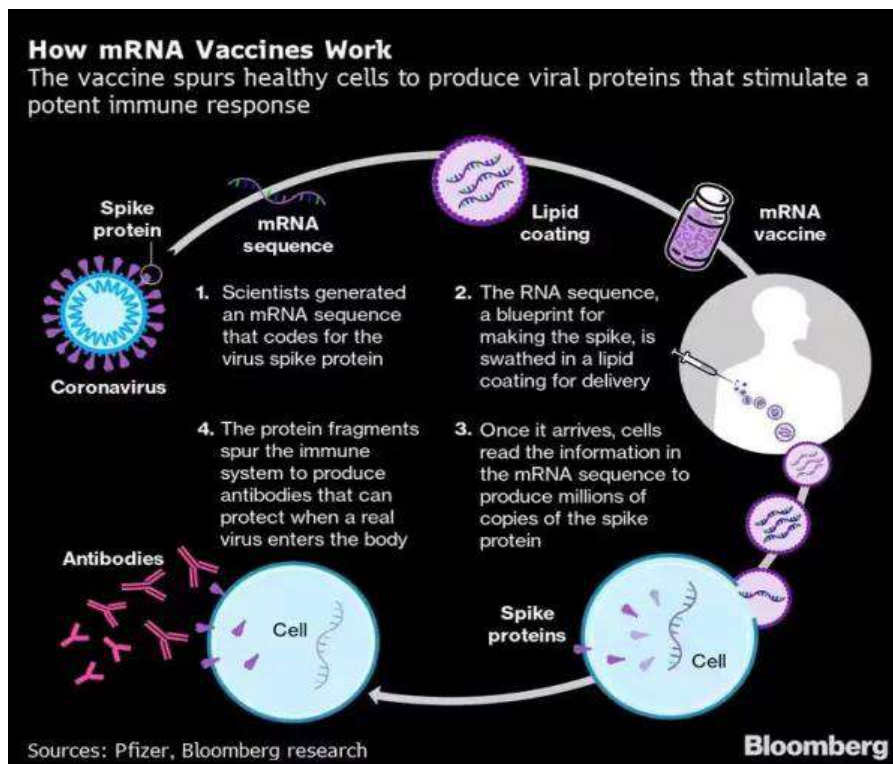
## About PACE Mission:

### Onset and Symptoms

- **The PACE (Plankton, Aerosol, Cloud, ocean Ecosystem) mission** is at the forefront of advancing scientific knowledge by employing cutting-edge polarimeters. These **instruments play a pivotal role in unraveling the intricate interplay of light, aerosols, and clouds,** offering profound insights into their impact on air quality and climate.


Ambee is now a part of PACE mission by NASA.

### Comprehensive Study of Aerosols:

- PACE goes beyond conventional missions by not only analyzing aerosols but also **delving into the intricate study of the ocean's color**. This holistic approach enhances our understanding of Earth's complex systems.

### Key Science Instrument: Ocean Colour Instrument (OCI)

- The cornerstone of PACE's scientific instrumentation is the **Ocean Colour Instrument (OCI).** Specifically designed to measure the **ocean's color across a broad spectrum**—from ultraviolet to shortwave infrared—OCI provides crucial data for comprehensive analysis.

### Advanced Polarimeters: SPEXone and HARP2

- **PACE features two state-of-the-art polarimeters**: the **Spectro-polarimeter for Planetary Exploration (SPEXone) and the Hyper Angular Research Polarimeter (HARP2).**
- These advanced tools work synergistically, offering complementary spectral and angular sampling, unparalleled polarimetric accuracy, and extensive spatial coverage.

### Enhanced Data Collection:

- The combination of **OCI, SPEXone, and HARP2** is strategically designed to provide improved atmospheric correction.
- This amalgamation ensures a comprehensive range of aerosol and cloud science data, surpassing the capabilities of OCI in isolation.

### Synergistic Payload and Breakthroughs:

- The synergistic payload comprising **OCI, SPEXone, and HARP2 positions the PACE mission** to make significant breakthroughs in aerosol-cloud-ocean research. By leveraging complementary capabilities, PACE aims to contribute substantially to our **understanding of Earth's interconnected environmental processes**.

# Anthrax

### Context

- According to the World Health Organisation (WHO), Zambia is facing a severe anthrax outbreak that affects both humans and animals.

### About Anthrax:

- Anthrax is caused by the **bacterium Bacillus anthracis**, which forms spores that can survive for long periods in the environment. These spores are highly resistant and can be found in soil, affecting grazing animals through ingestion or inhalation.

### Key points about Anthrax:

### Modes of Transmission in Humans

- **Cutaneous Anthrax:** This form is the most common and occurs when the spores come into contact with a break in the skin, leading to characteristic skin lesions.

- **Gastrointestinal Anthrax**: Consumption of contaminated meat from infected animals can cause this form, initially resembling food poisoning but progressing to severe abdominal issues.
- **Inhalational Anthrax:** Inhalation of the spores is the deadliest form, starting with flu-like symptoms and rapidly progressing to severe respiratory distress and shock.

## Diagnosis

- Laboratory tests **such as cultures, PCR, or ELISA help identify** the presence of Bacillus anthracis in blood, skin lesions, or respiratory secretions.
- **While no single test confirms anthrax exposure**, a combination of clinical findings and specialized tests assists in diagnosis.

## Prevention

- Vaccines are **available for both animals and humans**, especially for those at high risk due to occupation or geographic location.
- Minimize contact with potentially infected animals or their products.
- **Proper hygiene and handling procedures** for animal products are crucial in preventing transmission.

## Treatment

- Antibiotics like **ciprofloxacin, doxycycline, or levofloxacin can effectively treat** anthrax infections. Severe cases may require hospitalization for supportive care, such as fluid drainage and mechanical ventilation.
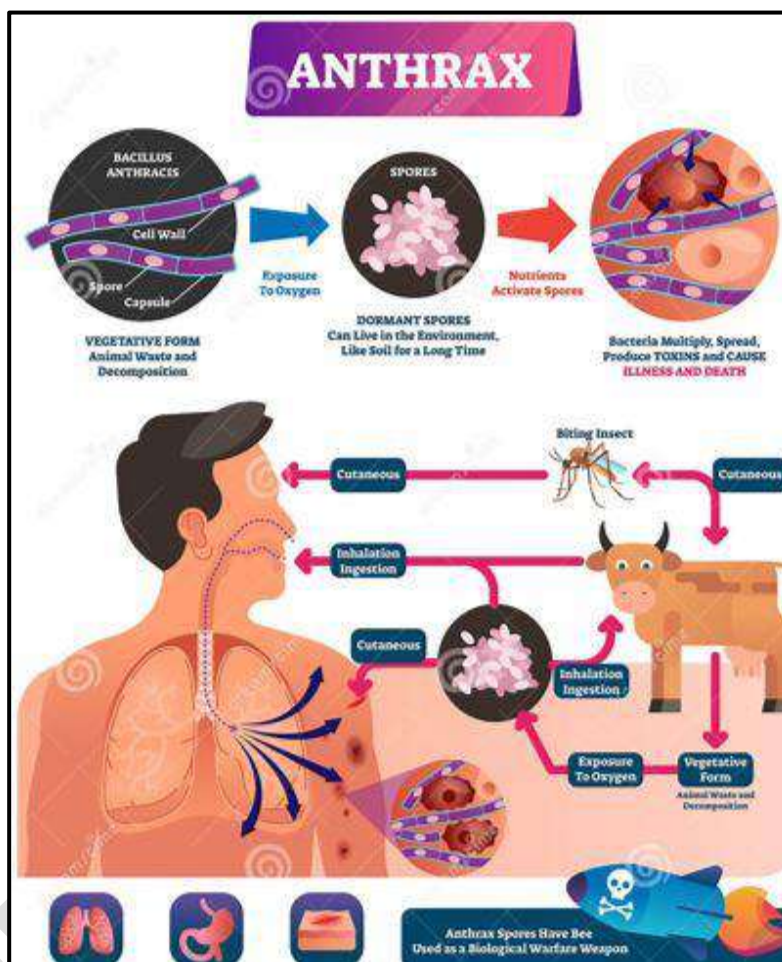
# E-cigarettes

## Context

- Recently, the World Health Organization (WHO) has urged governments to treat e-cigarettes similarly to tobacco and ban all flavors, threatening cigarette companies' bets on smoking alternatives.

## Details:

- *e-Cigarettes, also known as electronic nicotine delivery systems (ENDS) or electronic non-nicotine delivery systems (ENNDS)*, are battery-powered devices designed to vaporize a liquid into an inhalable aerosol. This article delves into the components and variations of e-cigarettes.

## Components of e-Cigarettes:

- e-Cigarettes consist of a battery-powered heating element that transforms a liquid into an aerosol.
- The key components of e-**cigarette liquid include nicotine, propylene glycol, glycerin, flavorings**, and various other chemicals.
- The combination of these elements creates the **vapor inhaled by users**.

## Types of e-Cigarettes:

- There is a diverse range of e-cigarettes available, reflecting the evolving landscape of electronic smoking devices. These **devices vary in design, features, and functionality. Some** are designed for nicotine delivery, while others function as non-nicotine alternatives.



Inside the e-cigarette

RECHARGEABLE BATTERY

CARTRIDGE HOLDING NICOTINE DISSOLVED IN PROPYLENE GLYCOL

1. A sensor detects when a smoker takes a drag, sending a signal to a processor that switches on a heater, known as an atomiser.

2. The atomiser heats up a nicotine solution to produce a vapour that can then be inhaled.

3. As someone draws on the e-cigarette, an LED light is also switched on by the processor, simulating a flame.

- **The term "electronic non-nicotine delivery systems (ENNDS)" is sometimes used to encompass** these non-nicotine variations.

### Understanding Electronic Nicotine Delivery Systems (ENDS):

- Electronic Nicotine Delivery Systems (ENDS) serve as a broader category encompassing various e-cigarettes.
- ENDS include devices designed for the delivery of nicotine, emphasizing their role in nicotine consumption.

### Diversity in Design and Features:

- **The e-cigarette market offers a plethora of designs and features**, catering to diverse user preferences. From sleek, pen-like devices to more advanced and customizable options, users can choose devices that suit their preferences and needs.

### Regulatory Landscape:

- The rapid growth of the e-cigarette industry has prompted regulatory scrutiny. **Governments and health organizations worldwide are developing frameworks to regulate the manufacturing, marketing, and use of e-cigarettes.** This includes considerations for both nicotine and non-nicotine delivery systems.

# JN.1 variant of COVID

### Context

- JN.1 was previously classified as a variant of interest as a part of its parent lineage BA.2.86.

### Details

- With cases of the Covid-19 sub-variant JN.1 on the rise across several countries, the World Health Organization (WHO) on Tuesday designated it as a "variant of interest" separate from its ancestor BA.2.86 that is commonly referred to as Pirola.
- Following the detection of the JN.1 COVID-19 variant, Karnataka announced that senior citizens are advised to wear masks.
- The JN.1 variant was **identified in Kerala** and a traveler from Singapore to Tamil Nadu, with additional cases found in Goa.

### Variant Lineage:

- JN.1 is identified as a sub-variant of BA.2.86, commonly known as Pirola. **Pirola was initially detected in the United States in September**, with global presence documented as early as January.

**Mutation Characteristics:**

- While JN.1 shares a close genetic relationship with Pirola, it distinguishes itself by possessing an additional mutation on the spike protein. **The high number of mutations on the spike protein** has captured the attention of researchers studying the variant.

**Potential Impact of JN.1:**

- **Transmission and Severity:** Currently, there is **no evidence to suggest that JN.1 leads** to more severe symptoms or exhibits a faster rate of transmission compared to other circulating variants of concern.

**WHO Assessment:**

- **The World Health Organization's (WHO) Technical Advisory Group on COVID-19 Vaccine Composition** has assessed both Pirola and JN.1.
- Importantly, the findings indicate that serum from both infected and vaccinated individuals has effectively neutralized these variants.
- **This suggests that existing vaccines maintain efficacy against JN.1,** providing reassurance in the ongoing efforts to combat the evolving landscape of COVID-19.

# Japan's SLIM (Smart Lander for Investigating Moon) Spacecraft

## Context

- SLIM (Smart Lander for Investigating Moon) entered lunar orbit on December 25 and is scheduled for a moon landing attempt on January 19.

## About SLIM:

- SLIM is a spacecraft launched by the Japan Aerospace Exploration Agency (JAXA) on September 7, 2023, with a weight of 590 kg, significantly lighter than Chandrayaan-3, which weighed 3,900 kg at launch.
- It aims to land on the Moon, becoming Japan's second attempt this year after the HAKUTO-R M1 lander, which crashed in April.



## Mission Journey and Approach to the Moon

- **Journey Duration:** Unlike Chandrayaan-3, SLIM opted for a more extensive four-month journey to the Moon, leveraging a distinct propulsion system and trajectory.
- **Route Strategy:** SLIM strategically employed the weak-stability boundary theory for a fuel-efficient trajectory. The spacecraft utilized Earth's gravitational forces by swinging around it multiple times to build kinetic energy before embarking on its lunar trajectory.

## Lunar Arrival and Orbit

- **December 25 Entry:** SLIM smoothly entered an elliptical lunar orbit on December 25, boasting an apogee of 4,000 km and a perigee of 600 km above the lunar surface.
- **Fuel Efficiency:** Opting for a fuel-efficient approach, SLIM sacrificed time to prepare for a landing attempt on January 19.

## Land and Exploration Goals

- **"Moon Sniper" Title:** SLIM aspires to achieve an exceptionally precise landing within 100 meters of its designated landing site, setting a new standard for moon-landing missions.
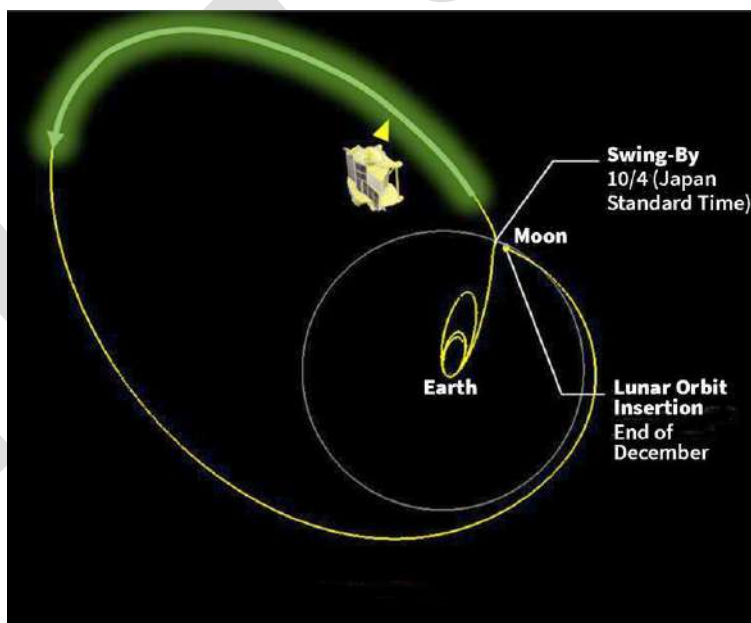
- **Landing Site:** Targeting an area near the Shioli Crater, SLIM utilized data from JAXA's SELENE orbiter to guide its descent.
- **Mission Tools:** SLIM plans to deploy two small rovers, LEV-1 and LEV-2, for studying the lunar surface, collecting temperature and radiation data, and exploring the moon's mantle.

**Impact on Chandrayaan-4 (LUPEX Mission)**

- **LUPEX Mission:** Chandrayaan-4, a collaborative Indian-Japanese mission (pending India's approval), is set to explore the moon's South Pole with the goal of extracting water from shadowed craters. The launch for Chandrayaan-4 is tentatively scheduled for 2026.
- **Technological Influence:** JAXA's SLIM mission, particularly its navigation systems and feature-matching algorithm, is expected to play a pivotal role in Chandrayaan-4's success in navigating challenging terrain near the moon's South Pole.
- **Collaborative Effort:** The collaborative endeavor envisions JAXA providing the launch vehicle and lunar rover, while India contributes the lander module. The specific landing site for Chandrayaan-4 is yet to be determined, differentiating it from the Chandrayaan-3's 'Vikram' lander, which touched down 600 km from the South Pole.

# Pterosaur

## Context

- New species of chaoyangopterid pterosaur has been discovered.

## Details:

### Who are Pterosaurs?

- Pterosaurs were flying reptiles that lived during the Mesozoic Era alongside dinosaurs.
- They belonged to the order Pterosauria, distinct from dinosaurs, and were the first vertebrates to evolve powered flight.

### Wing Structure of Pterosaurs:

- Pterosaurs possessed a distinctive wing structure characterized by a membrane composed of skin, muscle, and other tissues, **spanning between an elongated fourth finger and the body**.
- Some species exhibited crests on their heads, and diverse adaptations were observed to suit different ecological roles.

### Size Range of Pterosaurs:

- Pterosaurs exhibited a wide range of sizes, ranging from diminutive species with wingspans of around one meter to larger forms boasting **wingspans exceeding ten meters**.
- This size diversity allowed for **categorization into pterodactyloids**, representing the larger variants, and **rhamphorhynchoids**, encompassing the smaller ones.

### Habitats and Ecological Niches of Pterosaurs:

- Pterosaurs thrived in various habitats, including coastal **areas, inland lakes, and open oceans**.
- They occupied diverse **ecological niches, functioning as piscivores specializing** in **fish consumption, insectivores targeting** insects, and potential predators of small vertebrates.

### Subgroups of Pterosaurs:

- Pterosaurs can be broadly classified into subgroups based on tail characteristics, with *Rhamphorhynchoids* featuring long tails and **Pterodactyloids characterized by shorter tails**.
- Notable examples of Pterodactyloids include the **well-known species Pteranodon**.

### Extinction of Pterosaurs:

- Similar to dinosaurs, pterosaurs faced extinction at the conclusion of the Cretaceous Period, possibly due to a mass extinction event that reshaped **Earth's ecosystems.**

### Paleontological Significance of Pterosaurs:

- **Fossilized remains of pterosaurs have been unearthed on every continent**, playing a pivotal role in enhancing our comprehension of ancient ecosystems.
- Their fossils have proven instrumental in advancing studies on the evolution of vertebrate flight, contributing valuable insights into the history of life on Earth.

# Neglected Tropical Disease

## Context

- The World Health Organization (WHO) on December 15, 2023 added one of the world's most under recognised health challenges, noma, to its official list of neglected tropical diseases (NTD).

## Details

- Also **known as cancrumoris or gangrenous stomatitis**, it is a severe gangrenous disease of the mouth and face with a mortality rate of **approximately 90 per cent**.
- It is also associated with **extreme poverty, malnutrition** and poor access to sanitation and oral hygiene.



- **Noma** mainly **affects children aged 2-6 years old** and is found most commonly among those living in poor communities. **There is an extreme lack of awareness regarding the disease**.
- **There are no reliable numbers of cases** — the WHO website lists the 'latest' estimates 140,000 cases per year and a prevalence of 770,000 cases. However, the data dates back to 1998.
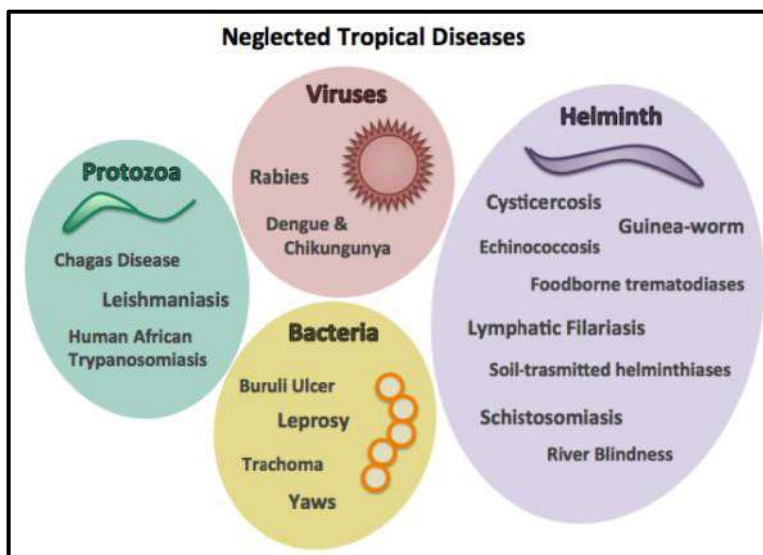
## About Noma

### Origins and Progression

- It typically begins as a **small ulcer within the mouth**, commonly appearing on the gums.
- This often happens following an illness like measles, which weakens the immune system, leaving the **body vulnerable to infections.**
- From this initial ulcer, Noma swiftly advances, causing rapid and massive tissue **destruction, eventually exposing the facial bones**.

### Symptoms

- Noma is **incredibly painful** and can cause additional symptoms like fever, foul breath, weight loss, and challenges in eating and speaking.
- The **severity of the pain and the progression of the disease** can significantly impact an individual's well-being.

### Prevention

- Preventing Noma involves improving living conditions and healthcare access for vulnerable populations.
- This includes ensuring **proper nutrition, immunization, oral hygiene practices**, and sanitation measures.

### Treatment

- Treatment for Noma typically involves **antibiotic therapy tofight infection**, wound care, pain management, and nutritional support.

- **Surgical interventions might be necessary to remove dead tissues** and reconstruct facial structures. However, accessibility to these interventions is often hampered due to socio-economic challenges faced by affected communities.

# Matrix-M Malaria Caccine

## Context

- Recently, the World Health Organization has approved the malaria vaccine in December 2023.

## Details

- The World Health Organization (WHO) on Thursday added the **R21/Matrix-M malaria vaccine,** developed by Oxford University and manufactured by Serum Institute of India, to its list of prequalified vaccines.
- **In October 2023, WHO had recommended its use for the prevention of malaria in children**, following the advice of the WHO Strategic Advisory Group of Experts (SAGE) on Immunization and the Malaria Policy Advisory Group.
- *R21/Matrix-M Vaccine is a new vaccine approved for the prevention of malaria in children. It was developed by the University of Oxford and the Serum Institute of India with support from the **European and Developing Countries Clinical Trials Partnership ('EDCTP'), the Wellcome Trust, and the European Investment Bank ('EIB').***

## About Malaria:

- Malaria is a **life-threatening disease caused by parasites transmitted** through the bites of infected female **Anopheles mosquitoes**.
- It is prevalent in hot and humid tropical areas, with children under 5 years being the most vulnerable group.

## Parasite Species:

- There are **five parasite species** causing malaria in humans, with **Plasmodium falciparum and Plasmodium vivax posing the greatest threat.**

## Symptoms of Malaria:

- The signs and symptoms of malaria mimic those of the flu, including fever, sweating, chills, headache, muscle aches, **fatigue, chest pain, breathing problems, cough, diarrhea**, nausea, and vomiting. As the disease progresses, it can lead to complications such as anemia and jaundice.
- **Cerebral malaria, the most severe form**, can result in a coma and accounts for a significant percentage of deaths in both children and adults.

## Treatment Options:

- **Malaria is both preventable and curable**, especially with early intervention. Treatment involves the administration of specific drugs, often in combination.
- The choice of medication depends on the type of parasite involved.
- Key antimalarial drugs include *chloroquine, hydroxychloroquine, primaquine, artemisinin-based therapy, and atovaquone-proguanil.*

# Non-communicable diseases

## Context

- The 2023 Navaratri festivities in Gujarat were overshadowed by the news that 10 people had purportedly died of heart attacks in a span of 24 hours.

## Details:

- According to a World Health Organization (WHO) report titled 'Invisible Numbers', a staggering 66% of deaths in India in 2019 were attributed to NCDs.

- The report also suggests that 22% of individuals aged 30 or older in India would succumb to NCDs before their 70th birthday, surpassing the global probability of 18%.
- While the spectre of NCDs presents a challenge, the good news is it is never too late to invest in health.

### About non-communicable diseases (NCD):

- Non communicable diseases (NCDs), also known as **chronic diseases,** tend to be of long duration and are the result of a combination of genetic, **physiological, environmental and behavioural factors**.
- **The main types of NCD are cardiovascular diseases** (such as heart attacks and stroke), cancers, chronic respiratory diseases (such as chronic obstructive pulmonary disease and asthma) and diabetes.
- NCDs disproportionately affect people in **low- and middle-income countries**, where more than three quarters of global NCD deaths (31.4 million) occur.



### Indian Health Initiatives:

- **National Programme for Prevention and Control of Cancer, Diabetes, Cardiovascular Diseases, and Stroke (NPCDCS):** Implemented under the National Health Mission (NHM), this initiative focuses on comprehensive prevention and control measures.
- **Strengthening of Tertiary Care Cancer Facilities:** The Central Government supports the establishment of State Cancer Institutes (SCI) and Tertiary Care Centres (TCCC) to enhance cancer care across the country.
- **Integration in Healthcare Infrastructure**: New AIIMS and upgraded institutions under the Pradhan Mantri Swasthya Suraksha Yojana (PMSSY) prioritize oncology, incorporating advanced healthcare technologies.
- **Affordable Medicines and Reliable Implants for Treatment (AMRIT):** AMRIT Deendayal outlets, operational in 159 Institutions/Hospitals, offer discounted Cancer and Cardiovascular Diseases drugs and implants.
- **Jan Aushadhi Stores:** Set up by the Department of Pharmaceuticals, these stores provide generic medicines at affordable prices, contributing to accessible healthcare for all.
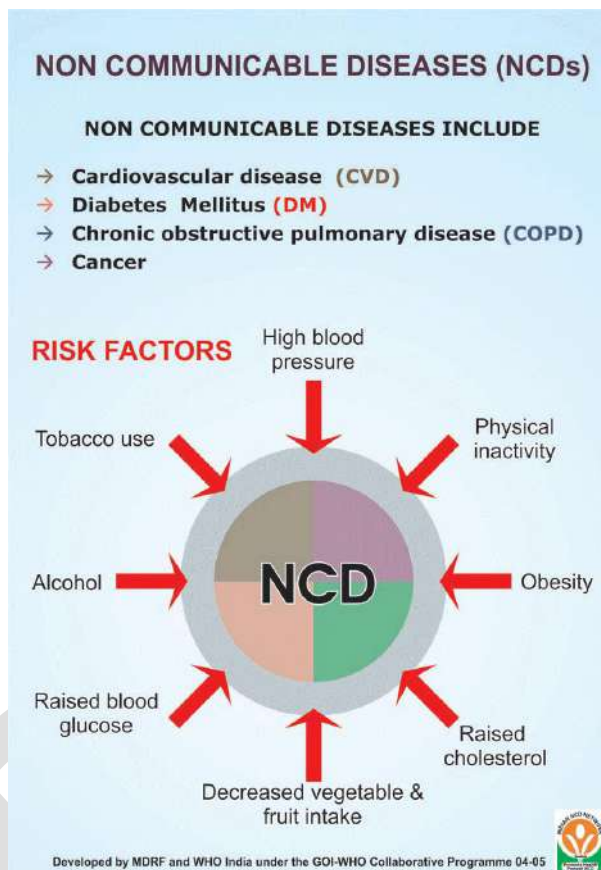
## 7.7    SNIPPETS



### Aarogya Maitri Aid Cube

- It is the world's first portable hospital.
- Designed indigenously under Project BHISHM (Bharat Health Initiative for Sahyog Hita and Maitri), the modular trauma management and aid system is made up of 72 detachable mini-cubes, each being a specialized station for emergency response and humanitarian efforts.
- The entire setup is lightweight and portable, enabling swift deployment to any location, whether through airdrops or ground transportation.
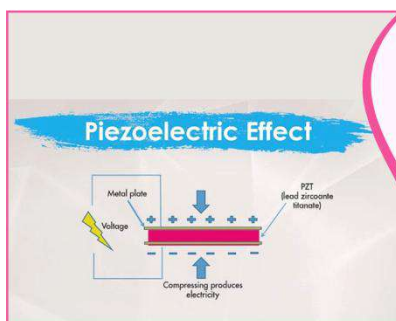


### Piezoelectricity

- Piezoelectricity, a fundamental phenomenon observed in certain materials, holds substantial significance in modern technology across a spectrum of industries.
- Its unique properties have revolutionized device design and functionality, contributing to advancements in sensing technology, timekeeping, and acoustic devices, among others.
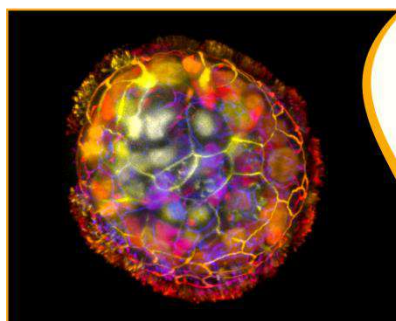


### Anthrobots

- Anthrobots, constructed from human tracheal cells and exhibiting the unprecedented ability to self-assemble and aid in neuronal healing, mark a significant milestone in the realm of bioengineered robots.
- Anthrobots, novel bioengineered robots, are created from human tracheal cells, enabling unique properties and applications.
- These biobots possess the remarkable ability to autonomously configure into diverse forms and sizes.
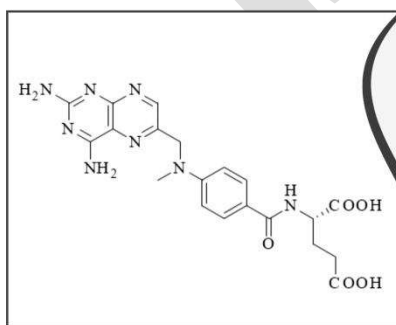


### Methotrexate

- It is a type of disease-modifying anti-rheumatic drug (DMARD) that is used to reduce inflammation and slow the progression of autoimmune diseases.
- Autoimmune diseases are caused when the immune system mistakenly attacks healthy tissues in the body.
- It is commonly used to treat rheumatoid arthritis, psoriasis, psoriatic arthritis, juvenile idiopathic arthritis, and Crohn's disease. It is also used to treat certain types of cancer, such as leukemia and lymphoma.
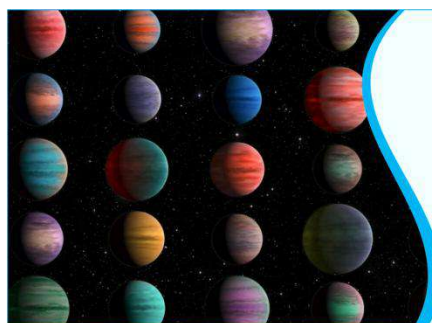
## Exoplanets

- Exoplanets are planets that orbit stars other than our sun and are outside of our solar system.
- According to NASA, approximately 5,000 exoplanets have been identified to date.
- According to scientists, there are more planets than stars since each star has at least one planet surrounding it.
- Exoplanets exist in a variety of sizes. They can be as large as Jupiter's gas giants or as small and rocky as Earth.
- They are also known to have a range of temperatures ranging from blazing hot to cold.
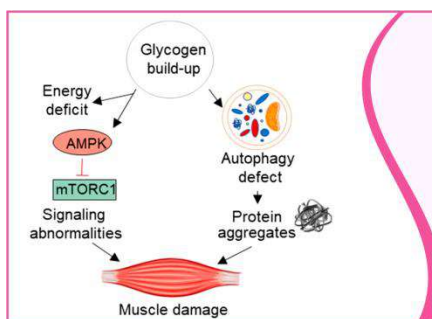
## Pompe Disease

- Pompe disease is a complex condition stemming from a genetic defect affecting the breakdown of glycogen in cells.
- Pompe disease arises due to mutations in the GAA gene, leading to deficient or dysfunctional acid alpha-glucosidase (GAA) enzymes.
- GAA normally resides within lysosomes, cellular compartments responsible for breaking down complex molecules like glycogen into simpler forms for energy usage.

## Gemini AI model

- Google Gemini is a novel multimodal general AI model introduced by Google, positioned as a versatile and powerful tool.
- This AI model has been developed from scratch, marking it as a collaborative effort by diverse teams within Google.
- The aim is to create an AI that feels less like conventional software and more like a useful and intuitive assistant.

## Elephant Endotheliotropic Herpesvirus

- EEHV belongs to the Herpesviridae family and specifically affects elephants.
- It comprises several subtypes, with EEHV1A being the most common and associated with severe disease in young Asian elephants.
- EEHV1B and EEHV2 are also identified but with varying prevalence and impact.
- Each subtype may exhibit genetic diversity, contributing to differences in virulence and disease manifestation. Understanding these variations is crucial for developing effective control measures.

## Cassiopeia A

- Cassiopeia A (Cas A) is a well-known and intensely studied supernova remnant (SNR) located in the constellation Cassiopeia, approximately 11,000 light-years away from Earth.
- It represents the remnants of a massive star that exploded in a supernova event, which was observed by Earth's inhabitants around the year 1680.



## Hemophilia

- Haemophilia, is a mostly inherited genetic disorder that impairs the body's ability to make blood clots, a process needed to stop bleeding.
- This results in people bleeding for a longer time after an injury, easy bruising, and an increased risk of bleeding inside joints or the brain.
- Those with a mild case of the disease may have symptoms only after an accident or during surgery.
- Hemophilia is caused by a mutation or change, in one of the genes, that provides instructions for making the clotting factor proteins needed to form a blood clot.



## Ketamine

- Ketamine is a dissociative anesthetic hallucinogen that has been used as an anesthetic for animals since the 1960s and was later approved for human use by the US Food and Drug Administration.
- It is known for creating a feeling of detachment from pain and the environment.
- In recent years, ketamine has gained attention for its potential therapeutic effects in treating depression and other serious mental health issues, especially in cases where traditional therapies have not been effective.



## National Geoscience Data Repository Portal

- It is an extensive web-based tool for geospatial data access, sharing, and analysis in India.
- The Geological Survey of India (GSI) and the Bhaskaracharya Institute of Space Applications and Geoinformatics (BISAG-N) led the NGDR effort.
- It is a major step towards democratizing important geoscience data, giving academics and industry stakeholders unparalleled access to priceless resources.

## Pradhan Mantri Bhartiya Janaushadhi Pariyojana

- It is launched by the Department of Pharmaceuticals, Ministry of Chemicals and Fertilizers.
- The Scheme aims to provide quality medicines at affordable prices to people through special Kendras known as Pradhan Mantri Bharatiya Janaushadhi Pariyojana Kendra.
- It was launched in 2008, under the name "Jan Aushadhi Medical Store" and later on re-launched in the year 2015 as 'Pradhan Mantri Jan Aushadhi Yojana' (PMJAY).

## Chronic Wasting Disease

- Zombie deer disease, or chronic wasting disease (CWD), is a fatal neurological disorder that affects deer, elk, moose and other members of the cervid family.
- It is caused by misfolded proteins called prions that infect the brain and spinal cord of the animals, leading to weight loss, behavioural changes, loss of coordination and death.

## 7.8    1 MAINS & 5 MCQs

**Q1. Examine the multifaceted challenges posed by pesticide hazards in contemporary agriculture. Discuss the socio-economic and environmental implications, along with potential mitigation strategies.**

**Answer:**

- Pesticides, while essential for modern agriculture, have emerged as a double-edged sword, presenting a complex web of challenges. The indiscriminate use of pesticides raises concerns about their impact on human health, the environment, and the socio-economic fabric of agricultural communities.

**Socio-Economic Implications:**

- Pesticide exposure poses significant health risks to farmworkers and nearby communities.
- **The long-term health consequences**, ranging from acute poisoning to chronic ailments, necessitate a re evaluation of the socio-economic dynamics within the agricultural sector.
- **Additionally, the economic burden of healthcare expenses** and lost productivity due to pesticide-related illnesses demands urgent attention.

**Environmental Consequences:**

- **Pesticide residues contaminate soil, water, and air,** leading to adverse effects on non-target organisms, biodiversity, and ecosystem stability.
- **The disruption of natural processes** and the emergence of pesticide-resistant pests underscore the urgent need for sustainable agricultural practices.
- **The long-lasting ecological repercussions** amplify the importance of adopting environmentally friendly alternatives.

**Mitigation Strategies:**

- **Addressing pesticide hazards requires a multi-pronged approach**. Integrated Pest Management (IPM) strategies, emphasizing biological controls and reduced chemical inputs, offer a sustainable alternative.

- **Investing in research and development of eco-friendly pesticides** and promoting organic farming practices can contribute to minimizing the negative impact on both human health and the environment.
- **Strengthening regulatory frameworks** and promoting awareness among farmers regarding the judicious use of pesticides are integral components of mitigation.
- The pervasive challenges associated with pesticide hazards demand a comprehensive and collaborative effort from stakeholders. Striking a balance between agricultural productivity and environmental sustainability is imperative. Through the adoption of innovative, eco-friendly practices and stringent regulatory measures, it is possible to mitigate the adverse effects of pesticides, ensuring a healthier future for both agriculture and society at large.

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**Q. Case Study**

Sarah, a 32-year-old veterinarian, was examining a herd of cattle on a farm. She noticed a few animals exhibiting symptoms of a mysterious illness. Days later, Sarah developed a skin lesion on her arm after handling one of the sick cows. She experienced fever and muscle aches along with the lesion. Concerned about her condition, Sarah sought medical attention.

*Q2. What is the most probable mode of transmission for Sarah's infection?*
A) Consuming contaminated meat
B) Inhaling anthrax spores
C) Contact with infected skin or fur
D) Through contaminated water

*Q3. Consider the following statements regarding the National Geoscience Data Repository portal:*
1. It is a gateway for geospatial data analysis and access throughout India.
2. It is led by the Bhaskarachaya Institute of Space Applications and Geoinformatics and the Geological Survey of India (GSI).
**Which of the statements given above is/are correct?**
A) 1 only
B) 2 only
C) Both 1 and 2
D) Neither 1 nor 2

*Q4. What recent developments have made 'ketamine' a recurring topic in news headlines?*
A) Its approval as an over-the-counter painkiller
B) Its role in controversial medical experiments
C) Its potential as a treatment for mental health conditions
D) Its inclusion in recreational marijuana products

*Q5. Consider the following statements:*
1. Pterosaurs were flying reptiles that lived during the Mesozoic Era alongside dinosaurs.
2. Pterosaurs became extinct at the end of the Cretaceous Period.
3. Fossilized remains of pterosaurs have been found on every continent.
**Which of the above statements is/are correct?**
A) 1 and 3 only
B) 2 only
C) 3 only
D) All

*Q6. Why has "Noma" recently been featured in news headlines?*
A) It's a newly discovered virus causing a global pandemic.
B) The disease has been eradicated globally.
C) It has been recognized as a neglected tropical disease by the WHO.
D) A breakthrough vaccine has been developed for Noma.

**ANSWERS: 2) C, 3) C, 4) C, 5) D, 6) C**

# 8. CULTURE & HISTORY

## 8.1 CULTURAL HERITAGE CONSERVATION 2023

### Context
- Recently, three heritage projects from Punjab and Haryana have secured prestigious spots among the UNESCO Asia-Pacific Awards for Cultural Heritage Conservation 2023.

### About UNESCO Asia-Pacific Awards for Cultural Heritage Conservation
- In its commitment to fostering collaboration between the **private sector and public entities** for the preservation of cultural heritage, UNESCO has been instrumental in acknowledging outstanding efforts through the **Asia-Pacific Awards for Cultural Heritage Conservation** since the year 2000.
- This prestigious award recognizes and celebrates the achievements of private sector initiatives and public-private partnerships that have demonstrated exceptional dedication to conserving or restoring structures, places, and properties of significant heritage value in the **Asia-Pacific region.**

### Diverse Recognitions across the Region
- Over the years, UNESCO has bestowed this esteemed award on various sites that have excelled in heritage conservation.
- Notably, **China, India, and Nepal** have prominently featured among the recognized locations.
- Among these, **China has seen five of its heritage** sites acknowledged, while India boasts six and Nepal one.

### Heritage Conservation Projects in India
- India, with its rich cultural tapestry, has seen several heritage sites honored with UNESCO Asia-Pacific Awards for Cultural Heritage Conservation.
- The award-winning sites in India showcase a diverse range of conservation efforts.

**Rambagh Gate, Amritsar:**
- Excellence Personified the Rambagh Gate in Amritsar stands out as a beacon of excellence, receiving the prestigious *"Award of Excellence."*
- This recognition serves as a testament to the meticulous conservation efforts employed in preserving this cultural gem, ensuring its legacy for current and future generations.

**Pipal Haveli, Punjab:**
- Sustainable Heritage Homestay Acknowledging the importance of sustainable development in heritage conservation, Pipal Haveli, a heritage rural homestay in Punjab, has been honored for its exemplary efforts.
- This recognition highlights the harmonious integration of conservation principles with sustainable practices.

**Karnikara Mandapam, Kerala:**
- Distinctive Conservation The**Karnikara Mandapam at KunnamangalamBhagawati Temple in Kerala** has earned the prestigious *"Award of Distinction."*
- This acknowledgment underscores the distinctive and commendable conservation work carried out at this cultural site.

**Epiphany, Haryana:**
- Meritorious Recognition **Epiphany in Haryana**, along with other notable landmarks such as the David Sassoon Library and Reading Room in Mumbai and Bikaner House in New Delhi, has received the *"Award of Merit."*
  - This recognition highlights the meritorious efforts employed in the conservation of these heritage structures, contributing to the broader tapestry of India's cultural legacy.

### Conclusion
- UNESCO Asia-Pacific Awards for Cultural Heritage Conservation serve as a platform to celebrate and encourage endeavors that go

above and beyond in safeguarding the region's cultural heritage, promoting a legacy

that resonates with the spirit of collaboration and preservation.

## 8.2    SHORT ARTICLES

# Parthenon Sculptures

## Context

- British Prime Minister Rishi Sunak cancelled a meeting with his Greek counterpart Kyriakos Mitsotakis over the status of the Parthenon Sculptures housed at the British Museum, sparking a diplomatic row sparked between Greece and the UK.



## Details:

- Athens has accused London of trying to avoid discussing the contested sculptures, more popularly known as the Elgin Marbles.
- Over the years, Greece has repeatedly asked for the sculptures' permanent return to Athens, but Britain and the British Museum have refused to do so.

## About Parthenon Sculptures:

### About

- The Parthenon Sculptures, also known as the **Elgin Marbles**, are a **collection of ancient marble sculptures** and architectural elements that were originally part of the Parthenon temple on the **Acropolis in Athens, Greece.**

### Construction

- The Parthenon, a **magnificent temple dedicated to the goddess Athena**, was built in the **5th century BC** during Athens' Golden Age under the direction of the sculptor Phidias.

### Design and decoration

- The Parthenon was adorned with exquisite sculptural friezes, metopes, and pedimental

sculptures depicting mythological narratives, religious ceremonies, and heroic figures.

### Significance

- **Artistic and Historical Importance**: The Parthenon Sculptures are renowned for their exceptional artistic quality, depicting ancient Greek mythology and history. They are considered a **symbol of classical art** and civilization.
- **Global Debate**: The ownership dispute between Greece and the UK over the sculptures has **sparked worldwide debate** regarding the repatriation of cultural artifacts and the ethical considerations of retaining heritage objects in foreign museums.

# Hornbill Festival

## Context

- The Hornbill Festival of Nagaland kickstarted on December 1. It is being held at the picturesque Naga heritage village Kisama.



## Details:

- The first five days of the Hornbill Festival of Nagaland, an annual tourism event of the state government, has attracted more than 78,000 visitors including 1,621 foreigners, according to official data.
- The 10-day-long festival that began on December 1 is being held at the picturesque Naga heritage village Kisama.

## Key facts about Hornbill Festival of Nagaland:

### About

- The Hornbill Festival is a **cultural extravaganza** celebrated in the Indian state of

**Nagaland**. It is named after the Indian Hornbill, a bird species that is highly respected and culturally significant in Naga traditions.

- The festival takes place **annually from December 1 to December 10** in the town of **Kohima, the capital of Nagaland.**

## Cultural significance

- The festival is a platform for various Naga tribes to come together and display their rich cultural heritage.

- **Each tribe showcases its unique customs,** traditional dances, music, and art forms, providing visitors with a vibrant and diverse cultural experience.

## Traditional Attire

- **Participants and performers often dress in traditional Naga** attire, adorned with distinctive ornaments and accessories that represent their respective tribes.

## Food Festivals

- **The Hornbill Festival is known for its food festivals**, where visitors can indulge in Naga cuisine. Various stalls offer traditional Naga dishes, allowing attendees to **savor the flavors of the region.**

## Music and Dance Performances

- The festival features a variety of music and dance performances, including traditional **folk dances, contemporary music shows, and competitions.**

- It is an opportunity for Naga artists to share their talents and for visitors to appreciate the cultural diversity.
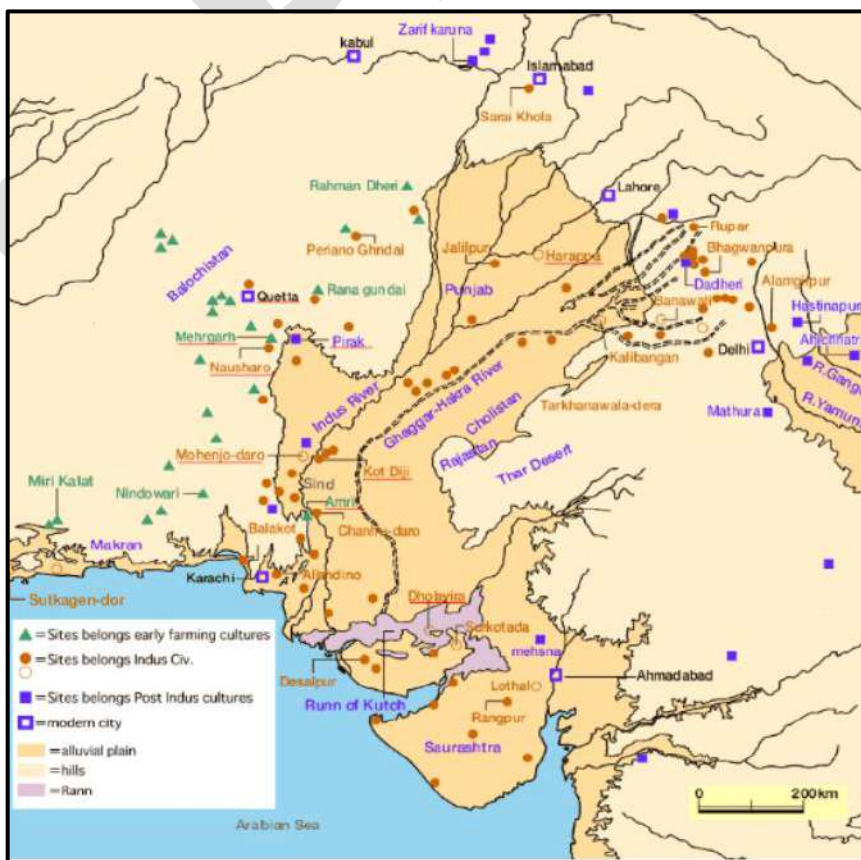
# Mohenjo Daro

## Context

- Archaeologists in Pakistan have discovered a remarkably unusual cache of 2000-year-old coins within the remains of a Buddhist shrine, constructed at the historic site of Mohenjo Daro (Pakistan).

## Details:

- The copper coins that were discovered are thought to date back to the Kushan Empire. During the Kushan Empire, Buddhism gained widespread popularity. Another name for these Buddhist shrines is stupa.

- According to LiveScience, the Buddhist temple that yielded these coins is today situated within the extensive remnants of Mohenjo Daro, a site that goes back to approximately 2600 BC in southeast Pakistan.

### About Mohenjo-daro:

- **Mohenjo-daro, a group of mounds and ruins, is a 5000-year-old** archaeological site located about 80-km off the city of Sukkur.
- It comprises the remnants of one of two main centres of the ancient Indus Valley Civilisation, the other one being Harappa, located 640 km to the northwest, in Punjab province.
- Mohenjo-daro, which means '**mound of the dead**', was one of the oldest cities of the world.
- **It is located in Sindh, Pakistan, next to the Indus River.**
- Here the Great Bath, uniform buildings and weights, hidden drains and other hallmarks of the civilization were discovered in the 1920's.
  - At Mohenjo-Daro the most **unicorn seals have been found**.
- The Mohenjo-Daro also has two mounds. The western mound is lower which was a citadel with 200 m X 400 m and eastern is a bigger which was having the relics of a buried city of size 400×800 meters.
- **Mohenjo-Daro was the largest city of the Indus valley civilization**. Both Harappa and Mohenjo-Daro can be called the capital cities of the civilization.
- **A square pillared hall is another important building found at Mohenjo-Daro.** The scholars agree that this pillared hall was a site for social gatherings.

# Mahaparinirvan Diwas

### Context

- The death anniversary of Dr BR Ambedkar is observed as the Mahaparinirvan Diwas.

### About Parinirvana:

- Parinirvana, in the context of Buddhism, signifies the attainment of nirvana or liberation both during an individual's life and after death. The term is derived from the Pali language, where "Parinibbana" is used to denote the fulfillment of Nirvana.

### Contributions of Dr. B.R. Ambedkar:

- **Advocate of Social Justice:** Distinguished activist for the rights of marginalized communities, particularly Dalits.
- **Bahishkrit Hitakarini Sabha (1924):** Founded to promote education and awareness among Dalits.
- **Mahad Satyagraha (1927):** Led a Satyagraha in Maharashtra challenging regressive Hindu practices.
- **Kalaram Satyagraha (1930):** Initiated the Nashik temple entry movement for untouchables.
- **Round Table Conferences (1930-1932):** Active participation, representing the untouchables and depressed classes.
- **Independent Labor Party (1936):** Founded, later known as the Scheduled Castes Federation.

- **Poona Pact (1932):** Signed an agreement with Mahatma Gandhi, providing reserved seats for Depressed Classes in Regional Parliaments and the Central Council of the States.
- **Labor and Industrial Reforms (1942-46):** Minister of Labor in the Viceroy's Executive Board, involved in formulating labor and industrial policies.
- **Architect of Indian Constitution:** Chairman of the Constitution Drafting Committee, played a pivotal role in drafting India's Constitution.
- **Bharatiya Bauddha Mahasabha (1955):** Founded to promote Buddhism as a means of social and spiritual liberation.
- **International Representative (1946):** Represented India at the inaugural session of the United Nations General Assembly, advocating for human rights and social justice.
- **Conversion to Buddhism (1956):** Embraced Buddhism in a public ceremony in Nagpur, along with many followers.

### Books and publications

1. Annihilation of Caste
2. The Buddha and His Dhamma
3. Thoughts on Linguistic States
4. The Untouchables: Who Were They and Why They Became Untouchables?
5. Mooknayak: It was a fortnightly newspaper, started by him In 1920 with the support of Shahu Maharaj of Kolhapur.

6. The Problem of the Rupee: Its Origin and Its Solution

# Adopt a Heritage 2.0

## Context

- Last date of submission of application for the current phase of for "Adopt a Heritage 2.0" Program has been decided as 31st December 2023.
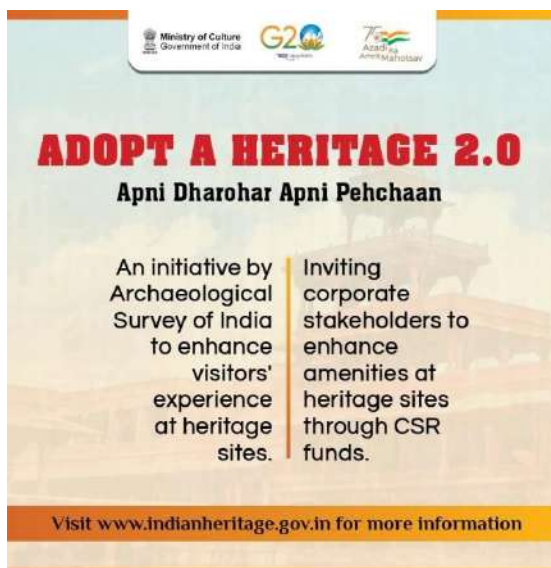


## Details

- The "Adopt a Heritage 2.0" program initiated by the Archaeological Survey of India (ASI) aims to enhance the upkeep and preservation of India's cultural heritage sites in alignment with the vision of **'Virasat Bhi, Vikas Bhi'.**
- This program is a revamped version of the earlier scheme, the **"Adopt a Heritage Scheme,"** launched in 2017.
- The Archaeological Survey of India (ASI) is a premium government agency that has 3696 monuments under its protection which are spread throughout the country.

## Key facts about Adopt a Heritage 2.0 Programme:

### Collaborative Effort

- It involves the **Ministry of Tourism, Ministry of Culture, ASI,** and State/UTs governments, promoting collaboration between various stakeholders for responsible tourism.

### Amenities and Monument Adoption

- Stakeholders can apply to adopt a monument or specific amenities at a monument through a dedicated web portal.
- This defines the amenities sought for different monuments under the **Ancient Monuments and Archaeological Sites and Remains Act (AMASR), 1958.**

### Corporate Contribution

- The **program seeks to encourage corporate stakeholders** to contribute to the preservation of heritage sites, fostering corporate social responsibility (CSR) activities for the next generations.

### Appointment Term

- The appointed stakeholders will have a term of five years initially, extendable up to five more years.

# Garba Dance

## Context

The Garba dance form is the **15th cultural item from India to make it to the UNESCO list**.

## About Garba dance:

### Introduction to Garba Dance:

- Garba is a vibrant form of Gujarati folk dance deeply rooted in the cultural fabric of India. It takes center stage during the auspicious nine-day Hindu festival of Navratri, dedicated to celebrating the triumph of good over evil.

### Symbolic Name Origins:

- The term "**Garba" finds its roots in Sanskrit**, specifically from the word representing the womb. This name suggests a connection to **themes of life and creation, adding a layer of symbolism to the dance**.

### Celebration of Fertility and Womanhood:

- Garba dances are not just a cultural spectacle but a profound celebration of fertility, honoring womanhood, and **paying tribute to a spectrum of mother goddesses.**
- The dance holds cultural significance by marking significant life events such as a girl's first menstrual cycle and her impending marriage.

### Central Element: Goddess Shakti:

- **During Garba, participants gather around a centrally lit lamp** or adepiction of the

Goddess Shakti, the embodiment of feminine energy in Hinduism.

- This central element serves as a focal point for the dance, infusing it with spiritual and cultural significance.

## Accompaniments and Universality:

- **Garba is accompanied by rhythmic music, singing, and clapping**, creating a lively and inclusive atmosphere. Importantly, this dance transcends demographic boundaries, allowing anyone, regardless of age, gender, or social status, to take part in the festivities.

## Evolution: Merge with Dandiya Raas:

- Modern Garba has evolved through the fusion of various dance forms, particularly influenced by **Dandiya Raas—a traditionally male dance.** This amalgamation has given rise to the high-energy Garba dance witnessed today, showcasing a dynamic blend of tradition and contemporary expression.

## Social Equality and Community Bonding:

- Garba plays a vital role in fostering social equality by breaking down socio-economic, gender, and sect structures. It serves as a unifying force, bringing together diverse and marginalized communities, thereby strengthening the bonds within the community.

# Santiniketan

## Context

- Visva-Bharati University has finally replaced the controversial plaques commemorating UNESCO's world heritage tag to Santiniketan with a board approved by the Centre.

## Details

- It was in mid-September that Santiniketan, founded by Debendranath Tagore and home to Visva-Bharati, the university set up by his son Rabindranath, was accorded the heritage status.

- Soon, plaques came up marking the site, but bore only the names of Prime Minister Narendra Modi, who is the Chancellor, and (the then) Vice-Chancellor Bidyut Chakrabarty.

## About Santiniketan:

- Santiniketan is a renowned **cultural and educational hub located in the Birbhum** district of **West Bengal,** India.

- It holds a special place in Indian history and culture due to its association with Rabindranath Tagore, a Nobel laureate poet, philosopher, and polymath.

- **Santiniketan translates to "Abode of Peace"** and was founded by **Tagore** as an experiment in education and art, which continues to influence generations of artists, scholars, and thinkers.

## Cultural Significance:

- Santiniketan has been a crucible for art and culture in India.

- **It was instrumental in the development of the Bengal School of Art, a significant movement in Indian art.** The school emphasized traditional Indian art forms, nature, and the spirit of the land.

- **The annual Poush Mela and Basanta Utsav (Holi festival) celebrations at Santiniketan attract people from all over India**. These events showcase the rich cultural heritage of India, with performances of music, dance, theater, and more.

- **Rabindranath Tagore's residence, known as the "Rabindra Bhavan," is a major attraction in Santiniketan**. His personal belongings, manuscripts, and artistic works are preserved here, allowing visitors to gain insight into his life and creative process.

# Andriamamelo Cave

## Context

- Unique, prehistoric rock art drawings have been discovered in the Andriamamelo Cave in western Madagascar.

### About Andriamamelo Cave:

- The Andriamamelo Cave, located in the western part of **Madagascar**, stands as a captivating geological wonder within the **PaysageHarmonieux Protege de Beanka**.
- Its unique geological structure is intricately woven into the **karstified limestone terrain**, making it a noteworthy feature in the region.

### Part of a Broader Karst Region:

- The cave is not an isolated marvel but rather an integral part of a larger karst region that encompasses the **UNESCO World Heritage site, Parc National de Bemaraha**.
- This broader karst landscape is celebrated for its exceptional geological features and rich biodiversity, making it a globally recognized treasure.

### Proximity to Antsingimavo Karst Area:

- The Andriamamelo Cave is in close proximity to the **Antsingimavo karst area**, a region that has received comparatively less attention in terms of research and study.
- **This proximity opens avenues for exploration and discovery**, shedding light on the unique characteristics of this relatively understudied karst zone.

### Essential Component of the Karst Landscape:

- As part of the karstified limestone terrain, the Andriamamelo Cave plays a vital role in the broader karst landscape.
- **The intricate underground formations within the cave** are a result of the dissolution of soluble rocks, primarily limestone.
- This cave, with its mesmerizing formations, adds to the overall allure of the karst environment.

# Channapatna Toys

### Context

- According to a post shared by the United Nations Office on Drugs and Crime (UNODC), Afghanistan, hundreds of children in that country have been affected by drug abuse.

### Details:

- Toys made in Channapatna near here have now become part of children's academic activities in Afghanistan.

- The Ministry of External Affairs sent some toys to Afghanistan some time ago as a friendly gesture. This traditional craft of Karnataka has received the Geographical Indication (GI) tag.

### About the Channapatna Toys:

### About

- Channapatna, Karnataka, boasts a **rich tradition of crafting distinctive wooden toys and dolls, primarily** made from the wood of the indigenous Wrightia tinctoria tree.
- These toys have earned global recognition, designated as a Geographical Indication (GI) under the World Trade Organization.

### Location

- Situated in the Ramanagara district, Channapatna is celebrated as the **"GombegalaOoru" or toy-town of Karnataka.**
- The town has been a hub for handmade lacquer wooden toys for centuries, providing significant employment opportunities for the local community.

### Gombe Habba

- The **program seeks to encourage corporate stakeholders** to contribute to the preservation of heritage sites, fostering corporate social responsibility (CSR) activities for the next generations.

### Historical Patronage

- Channapatna toys **gained prominence during the era of Tipu Sultan**, the historic ruler of Mysore, who admired the art and contributed to its development.
- These toys were historically exchanged as gifts during Dussehra celebrations.

### Evolution of Craft

- **The art of Channapatna toy-making** underwent significant changes, notably with the introduction of Japanese doll-making techniques by Bavas Miyan.
- Over the centuries, **ivory-wood was the primary material,** later diversifying to include rosewood, sandalwood, rubber, sycamore, cedar, pine, and teak.

### Manufacturing Process

- The manufacturing process involves several stages, including wood procurement,

seasoning, shaping, carving, coloring, and polishing.
- **While traditional ivory-wood remains integral**, other woods are now utilized.
- **Vegetable dyes** are employed to ensure the safety of the toys, aligning with contemporary standards for children's products.

# Yogmaya Temple

## Context

- A noble in the court of Mughal Emperor Akbar II by the name of Lala Sidhu Mal built the temple between 1806 and 1837.

## About Yogmaya Temple:

- The Yogmaya Temple, also known as **Jogmaya Temple or Jogmaya Mandir**, holds significant historical and religious importance in India.
- **Dedicated to the goddess Yogmaya**, believed to be the **sister of Lord Krishna and an incarnation of Durga**, the temple's history is intertwined with ancient mythology and has witnessed phases of destruction and reconstruction by various rulers.

## Architectural Description

- **Structural Evolution:** The present temple, reconstructed in the 19th century, is a contemporary structure comprising an entrance hall, a sanctum sanctorum housing the main idol of Yogmaya, and a dome and truncated shikara (tower).
- **Idol and Worship:** The main idol, made of black stone and adorned with sequins and cloth, represents Yogmaya. Devotees offer flowers and sweetmeats without the tolling of bells during worship.

## Continuing Tradition and Care

- **Community's Role:** The local community, consisting of over 200 people tracing their ancestry to a common forefather, actively participate in temple maintenance and rituals, following age-old customs.
- **Cultural Expansion:** Similar temples dedicated to Yogmaya exist across India in places like Rajasthan, Vrindavan, Dehradun, among others.
  - Jogmaya Temple, Barmer Rajasthan

  - Jogmaya Temple, Multan
  - Jogmaya Temple, Jodhpur, Rajasthan
  - Yogmaya Temple, Vrindavan
  - Yogmaya Temple, Naya Bans Khari Baoli, Old Delhi
  - Yogmaya Temple, Dehradun, Uttarakhand
  - Jogmaya Tripura Sundari Temple

# Shree Mandira Parikrama Project

## Context

- Shree Jagannath Temple Administration (SJTA), which administers affairs of the 12th century temple, is sending invitations to 857 temples in Odisha and 180 major temples in other States.
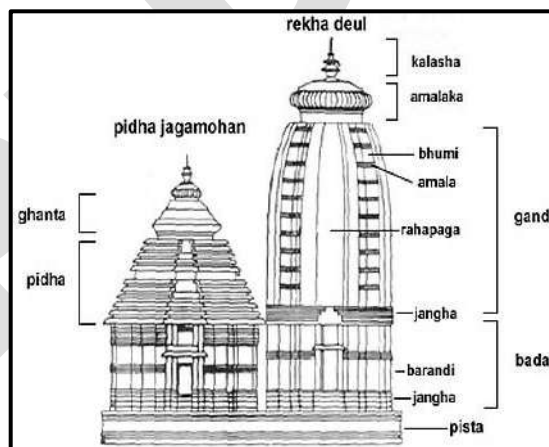


## Details

- The Archaeological Survey of India (ASI) has asked the Odisha government to tweak its Shree Mandira Parikrama Project (SMPP)—a massive beautification project around the 12th-century Jagannath temple in Puri.

## About the Jagannath temple:

### Location

- The Shree Jagannath Temple is an important Hindu temple dedicated to Jagannath, a form of **Vishnu, in Puri in the state of Odisha**.
- Puri is one of the four Dhamsor most sacred places of pilgrimages for the Hindus in the country.

### Founder

- The temple was built by the Ganga dynasty king **Anantavarman Chodaganga in the 12th century CE**, as suggested by the **Kendupatna**

copper-plate inscriptionof his descendant **Narasimhadeva II.**

### Festival

- The Puri temple is famous for its annual Ratha yatra, or chariot festival, in which the three principal deities are pulled on huge and elaborately decorated temple cars.

### Saints associated

- The temple is sacred to all Hindus and especially in those of the Vaishnava traditions. Many great Vaishnava saints, such as **Ramanujacharya, Madhvacharya, Nimbarkacharya, Vallabhacharya and Ramananda** were closely associated with the temple.

### Temple architecture

- The Odisha style of temple architectureis also accorded as Kalinga Nagara style. It is known as White Pagoda.
- The Kalinga Nagara style comprises three typologies i.e. Rekha Deula, PidhaDeula, and Khakhra Deula.
- The famous temple of Lingaraja at Bhubaneshwar and Jagannatha at Puri are two prominent and gigantic examples of Rekha Deula.

# Kolattam Dance

### Context

- Recently, the Kolattam dance was performed during Balotsav, a children's festival, in Vijayawada, Andhra Pradesh.



### About the Kolattam dance:
### About

- Kolattam is a traditional folk dance deeply rooted in the cultural heritage of **Andhra Pradesh and Tamil Nadu.**

- Often performed as a religious offering, this dance form holds a special **significance as women dancers pay homage** to the temple Goddess in various regions of Andhra Pradesh.

### Alternate Names

- Known by different names such as **Kolkollannalu or Kollannalu, Kolattam** reflects the rich linguistic diversity and cultural nuances present in the regions where it is practiced.

### Women Participation

- Kolattam stands out as a **predominantly female dance**, with men typically not participating in its performances.
- This exclusivity adds a unique charm to the dance, creating a sacred and communal atmosphere.

### Group Dynamics and Pair Performances

- Typically, Kolattam is a group dance where two artists are paired together. This collaborative aspect **enhances the rhythmic and synchronizedmovements** of the dance, creating a visually captivating spectacle.

### Ritualistic Nature and Religious Offering

- One of the distinguishing features of Kolattam is its role as a form of religious offering.
- **Women dancers engage in this dance as a means of expressing reverence** and devotion to the **temple Goddess**, adding a spiritual dimension to the art form.

### Instrumentation

- Central to the dance are the **Kolattam Karas, solid wooden sticks** crafted with wood and lacquer.
- Held by each dancer, these sticks become an extension of their movements, contributing to the rhythmic and **percussive elements** of the performance.

### Rhythmic Movements with Kolattam Kara

- The dance **involves intricate choreography** where each dancer wields two Kolattam Karas, moving them in a synchronized rhythm.
- This dynamic use of **sticks adds a visual and auditory flair** to the performance, making Kolattam a captivating and engaging art form.

# Tansen Samaroh

## Context

- Gwalior recently gained recognition as the "**Creative City of Music**" in UNESCO's Creative Cities Network (UCCN) in November, elevating its status in the realm of music and culture.



## Details:

- Madhya Pradesh Chief Minister received the Guinness World Records certificate, announcing December 25 as "**Tabla Day**" to be celebrated annually in **Madhya Pradesh**.
- Around 1,300 tabla players joined forces at the **99th International Tansen Mahotsav in Gwalior** to set the Guinness World Record for the "**largest table ensemble.**"
- The feat, accomplished during the ongoing festival, showcased Gwalior's musical prowess.

## About Tansen Samaroh

- **Occasion:** Tansen Samaroh or Tansen Sangeet Samaroh is an annual music festival held in **Behat village of Gwalior district, Madhya Pradesh,** typically in December.
- **Duration:** This extravaganza spans four days, dedicated to commemorating the legendary Indian musician, Tansen.
- **Purpose:** The festival serves as a tribute to the renowned Maestro, drawing artists and music aficionados from around the globe.

## Organizers and Venue:

- **Hosting Entity:** The event is organized by the **Ustad Alauddin Khan Kala Evam Sangeet Academy** under the Department of culture, Government of Madhya Pradesh.

- **Location:** Held near the tomb of Tansen, the festival's venue holds cultural significance due to its proximity to the great musician's resting place.

## Evolution into a National Festival:

- **Origins:** Initially, Tansen Samaroh was a local celebration.
- **National Recognition:** It gained national prominence thanks to BV Keskar, the **Union Minister for Information and Broadcasting (1952-1962).** His initiative transformed the festival into a prominent national music festival.

# Sunehri Bagh Masjid

## Context

- The debate around the Sunehri Bagh Masjid, near the Parliament, has gathered pace after the New Delhi Municipal Council (NDMC) sought public opinion on its proposed demolition.

## Details:

- The December 24 notice published in various newspapers has led to a row with people claiming that the council was raising the issue of traffic congestion just to demolish the structure that stands near Udyog Bhawan Metro station, at the intersection of Maulana Azad Road, Motilal Nehru Marg, and Kamraj Road.

## About the Sunehri Bagh Masjid:

### Location

- The Sunehri Bagh Masjid, also **known as the Golden Garden Mosque**, is a significant historical monument with roots dating back to a bygone era.
- The mosque is situated in the **heart of Old Delhi, India,** and stands as a testament to the architectural and cultural richness of the region.

### Architectural Marvel

- Renowned for its architectural splendor, the Sunehri Bagh Masjid is an exquisite example of Mughal architecture.
- Built during the reign of **Roshan-ud-Daula Zafar Khan in the mid-18th century,** the mosque boasts intricate details, including

ornate domes, minarets, and decorative elements that showcase the **Mughal design aesthetics.**

## Golden History

- The mosque earns its colloquial name, the Golden Garden Mosque, from the historical accounts of its **golden-plated spires and domes**.
- The **shimmering goldenhue** added a majestic allure to the structure, making it a prominent landmark in the city.

## Purpose and Function

- Like many mosques of its time, the Sunehri Bagh Masjid served as a place of **worship and congregation for the local Muslim community.**
- The expansive courtyard and prayer halls provided space for communal prayers, **fostering a sense of unity** among the worshippers.

## Architectural Elements

- The **mosque features a symmetrical layout** with a central prayer hall, adorned with intricate calligraphy and geometric patterns.
- The **minarets and domes contribute to the grandeur of the structure**, reflecting the Mughal emphasis on balance and symmetry in architectural design.

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## 8.3    SNIPPETS
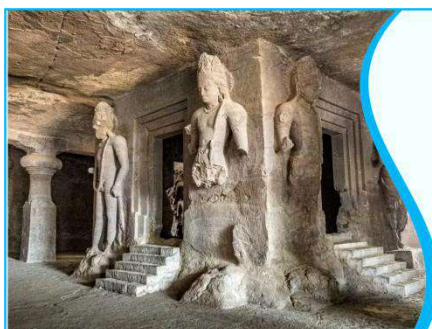


### Elephanta Caves

- Elephanta Caves is a UNESCO World Heritage Site situated on Elephanta Island in Mumbai Harbour, Maharashtra.
- Believed to have been constructed between the 5th and 8th centuries AD, the caves represent an important era in Indian history, reflecting the rich cultural tapestry of ancient India.
- While the exact origins remain debated, it is generally believed that the Elephanta Caves were built during the rule of various dynasties, including the Chalukyas and the Rashtrakutas.

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## 8.4    1 MAINS & 5 MCQs

**Q1.** *The Battle of Talikota in 1565 marked a significant turning point in the political landscape of medieval South India. Assess the socio-political ramifications of the battle and its impact on regional power dynamics and subsequent historical developments. (250 Words)*

### Introduction:

- The Battle of Talikota in 1565 stands as a pivotal event in medieval South Indian history, reshaping the socio-political fabric of the region. Fought between the Deccan Sultanates and the Vijayanagara Empire, its aftermath had profound consequences on the power dynamics and subsequent historical developments in the region.

### Body:

### Collapse of Vijayanagara Empire:

- The Battle of Talikota resulted in the catastrophic defeat of the Vijayanagara Empire. The sultans of the Deccan, united under a common cause, strategically outmaneuvered the Vijayanagara forces.
- The fall of the Vijayanagara capital not only marked the end of a once-mighty empire but also paved the way for the disintegration of its political and social structures.

### Impact on Regional Power Dynamics:

Post-Talikota, the Deccan Sultanates emerged as dominant political entities. The victory allowed them to assert control over vast territories previously under Vijayanagara's influence.

This shift in power dynamics led to the fragmentation of the region into smaller, more manageable polities, creating a complex mosaic of rivalries and alliances among the Deccan Sultanates.

## Socio-Political Ramifications:

- The Battle of Talikota catalyzed a socio-political transformation. The defeat shattered the political unity of South India, leading to the rise of smaller, decentralized states.
- The ensuing period witnessed a realignment of socio-cultural affiliations and power structures, with local rulers playing a more prominent role.
- The impact extended beyond politics, influencing the artistic, architectural, and cultural landscapes of the region.

## Historical Developments:

- The aftermath of Talikota laid the foundation for the emergence of new political entities, including the Nayakas, Marathas, and various smaller kingdoms.

- This fragmentation marked the beginning of a prolonged period of political flux, characterized by shifting alliances and conflicts.
- The Battle of Talikota, therefore, set in motion a series of historical developments that shaped the trajectory of South Indian history for centuries to come.

## Conclusion:

- The Battle of Talikota in 1565 was a watershed moment in medieval South India, precipitating the decline of the Vijayanagara Empire and redefining regional power structures. Its socio-political ramifications were far-reaching, impacting the course of history in the Deccan and shaping the dynamics of subsequent political entities in the region.

........................................................................................................................

**Q2. Consider the following statements regarding the Parthenon Sculptures, also known as the Elgin Marbles:**

1. The Parthenon Sculptures are ancient stone artworks that adorned the Parthenon, a temple dedicated to the goddess Athena, situated in ancient Rome.
2. Thomas Bruce, the 7th Earl of Elgin and British ambassador to the Ottoman Empire, was responsible for acquiring and transporting the sculptures to Britain.
3. The Parthenon Sculptures are currently housed and displayed in the Louvre Museum in Paris, France.

**Which of the statements above is/are correct?**
A) 1 and 2 only
B) 2 only
C) 2 and 3 only
D) 1 and 3 only

**Q3. Which historical figure is associated with the restoration of the Yogmaya Temple after its destruction by Islamic rulers?**
A) Akbar II
B) Samrat Vikramaditya Hemu
C) Qutbuddin Bakhtiar Kaki
D) Mirza Jehangir

**Q4. Which of the following statements with reference to Channapatna toys is/are correct?**

1. Only ivory-wood is the wood used in the making of these toys.

2. The greater prominence of the Channapatna toys can be traced to patronage from Tipu Sultan.
3. Channapatna is a city in the Ramanagara district of Karnataka.
A) 1 and 2 only
B) 2 and 3 only
C) 1 and 3 only
D) 1, 2 and 3

**Q5. Which of the following states is associated with the traditional folk dance form known as Kolatam?**
A) Kerala
B) Tamil Nadu
C) Andhra Pradesh
D) Rajasthan

**Q6. Consider the following statements about Sunehri Bagh Masjid:**

1. Sunehri Bagh Masjid is located in Lahore, Pakistan.
2. The mosque gets its name, "Sunehri Bagh," from the golden color of its intricate Mughal architecture.
3. It was commissioned by Emperor Akbar during the Mughal era.

**Which of the above statements is/are correct?**
A) 1 only
B) 2 and 3 only
C) 1 and 3 only
D) All of the above

**ANSWERS: 2) A, 3) B, 4) B, 5) C, 6) D**

# 9. GEOGRAPHY & DISASTER MANAGEMENT

## 9.1    POLAR STRATOSPHERIC CLOUDS

### Context
- Recently, weather watchers have captured images of rare Polar stratospheric clouds over Scotland, northern England, and the West Midland.

### Details
- For the third consecutive day, residents have been treated to an extraordinary display in the clouds hovering above the Arctic.
- Ramune Sapailaite, a local observer in Gran, Norway, captured the phenomenon on her cellphone, noting that while the clouds were present throughout the day, "the colors exploded just before sunset."



- The Polar stratospheric clouds, also known as nacreous clouds, are among the rarest and most stunning atmospheric phenomena.
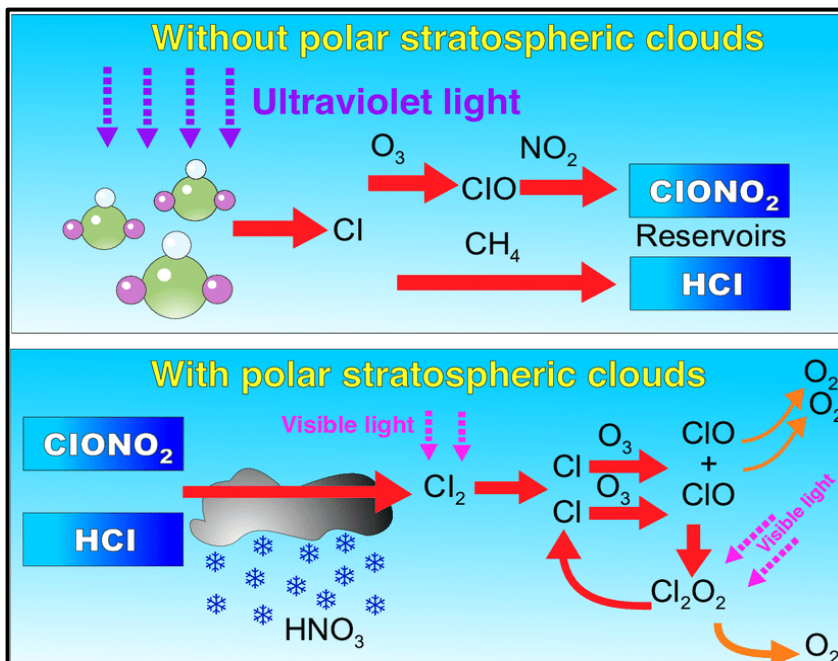
### About Polar Stratospheric Clouds (PSCs)
- Polar Stratospheric Clouds (PSCs), also known as **nacreous clouds due to their iridescence,** are formations observed in the **winter polar stratosphere.**
- They often occur downstream of mountain ranges, influenced by gravity waves in the lower stratosphere.

#### Characteristics and Formation:
- **PSCs exhibit wave-like formations that undulate and extend as they progress**. They form at extremely low temperatures around -85°C, colder than the average lower stratosphere temperatures.
- **Composed of ice particles about 10m in diameter**, they create bright iridescent colors through diffraction and interference. PSCs form at high altitudes, **typically between 15 and 25 kilometers.**

#### Factors Influencing PSC Formation:
- PSC formation is associated with **orographic features and strong winds in the troposphere**, causing mountain waves.
- These waves may propagate into the stratosphere, resulting in lifting and cooling that produces PSCs.
- While these clouds are more common near the **South Pole,** recent observations have noted their presence near the **North Pole.**

#### Types of Polar Stratospheric Clouds
**PSCs are categorized into two types based on their chemical composition:**
- **Type I Clouds:** These clouds contribute to polar ozone depletion, containing water, nitric acid, and/or sulfuric acid. They form at **temperatures of -78°C or lower**. Type Ia clouds consist of large particles of

nitric acid trihydrate, Type Ib clouds contain small spherical particles of a liquid super cooled ternary solution, and Type Ic clouds are composed of metastable **water-rich nitric acid in solid form**.

- **Type II Clouds:** Extremely rare in the Arctic, these clouds are solely made up of water ice and form at **temperatures of -83°C or lower**. Only Type II clouds necessarily exhibit the characteristic iridescence associated with nacreous clouds.

## PSCs and Ozone Depletion:

- Initially considered oddities, **Type I clouds are now recognized as sites of harmful ozone** destruction over Antarctica and the Arctic.
- **They act as catalysts**, converting man-made chlorine into active free radicals that contribute to ozone depletion.
- The surfaces of **PSCs facilitate chain reactions** that release chlorine from its reservoirs, linking the ozone depletion cycle with the presence of these clouds.

## Impact of PSCs on Ozone Depletion Cycle:

- PSCs play a critical role in the **ozone depletion cycle by providing substrates for chemical reactions** that liberate chlorine from its reservoirs.
- **The presence of stratospheric clouds at the poles** accelerates reactions between chlorine compounds, contributing to the breakdown of ozone molecules.
- This connection underscores the significance of understanding PSCs in the context of ozone depletion.

## 9.2   SHORT ARTICLES

# Cyclone Michaung

## Context

- On December 5, Cyclone Michaung (pronounced mig-jaum) made landfall over Nellore in Andhra Pradesh as a super-cyclonic storm.

## Details

- On November 29, the India Meteorological Department (IMD) identified a well-marked low-pressure area in the southwest Bay of Bengal. It was expected to become a depression by November 30, a deep depression by December 2, and eventually a cyclonic storm by December 3.
- Thereafter, the IMD forecast that the system would move north towards coastal Andhra Pradesh, bringing rain and strong winds to areas in north Tamil Nadu on December 3 and 4, while traveling parallel to the latter's coast.
- It was finally expected to cross over land between Nellore and Machilipatnam as a cyclonic storm, with 80-90 km/hr winds gusting to 100 km/hr.
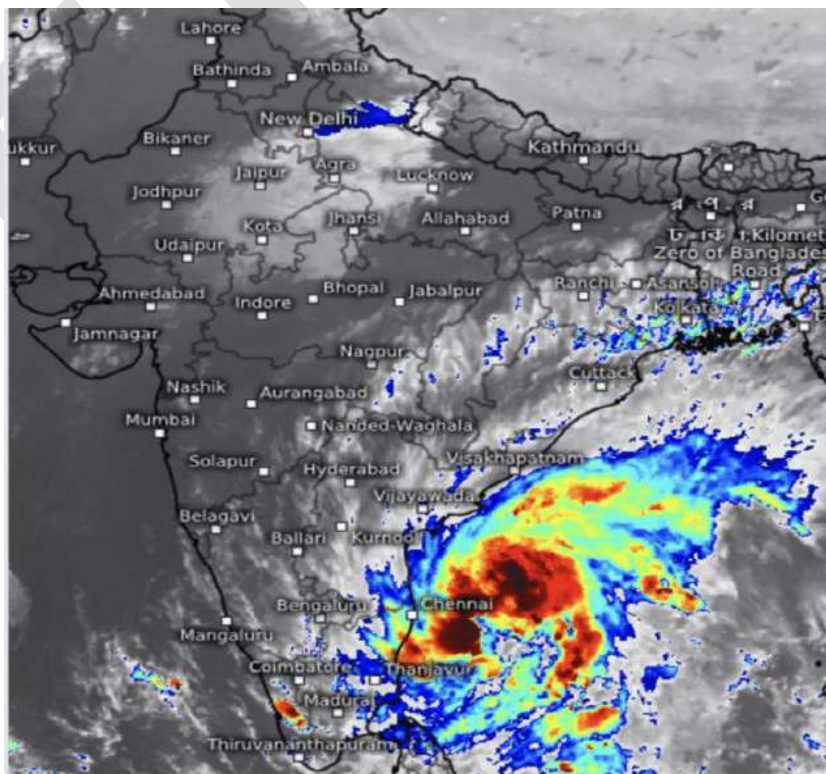
**Why was Michaung named so?**

- In 2000, a panel of the World Meteorological Organisation together with members of the United Nations Economic and Social Commission prepared the list of names of tropical cyclones in the Bay of Bengal and the Arabian Sea, to be given from the September 2004 season.
- The name of each cyclone is picked from this list and cycles through each country's suggestion.

*For example, after Michaung (by Myanmar), the next five cyclones will be called 'Remal' (Oman), 'Asna' (Pakistan), 'Dana' (Qatar), 'Fengal' (Saudi Arabia), and 'Shakhti' (Sri Lanka).*

**About Tropical cyclones:**

- **Tropical cyclones are those which develop in the regions** between the Tropics of Capricorn and Cancer.
  - They are the most devastating storms on Earth.
- **Such cyclones develop** when "thunderstorm activity starts building close to the center of circulation, and the strongest winds and rain are no longer in a band far from the center,".
- **The core of the storm turns warm, and the cyclone gets most of its energy f**rom the "latent heat" released when water vapor that has evaporated from warm ocean waters condenses into liquid water, the agency added.
  - Moreover, warm fronts or cold fronts aren't associated with tropical cyclones.
- **Tropical cyclones have different names** depending on their location and strength.
- For instance, they are known as hurricanes in the Caribbean Sea, the Gulf of Mexico, the North Atlantic Ocean, and the eastern and central North Pacific Ocean.
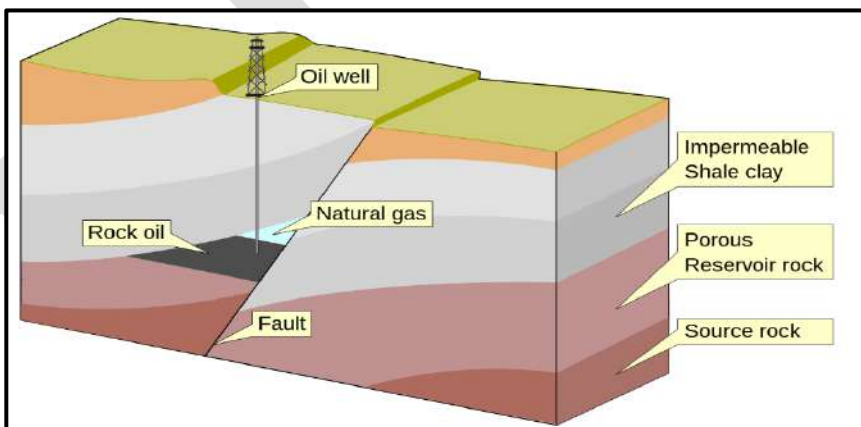
# Fault Line

## Context

- A team of geologists, mineralogists, and Earth and ocean scientists affiliated with institutions in Canada, the U.S., and France has discovered a 72-kilometer fault line on Canada's Vancouver Island.

## Details:

- In their project, reported in the journal Tectonics, the group discovered the fault line after finding evidence of an earthquake on the Saanich Peninsula thousands of years ago.



- Earth scientists have long suspected that parts of the **Georgia Basin in Canada**have a seismic history. However, evidence of earthquakes has been difficult to find due to the forest cover in the region.
- In this new effort, the researchers conducted an analysis of historical imagery, conducted remote sensing, hiked through forests, and conducted shallow geophysical surveys to learn more about the possible seismic history of the Saanich Peninsula, which is situated on the southeastern part of Vancouver Island.

## What is a Fault line?

- A fault line is a geological feature representing **a boundary or zone** where two tectonic plates meet. Tectonic plates are massive pieces of the Earth's lithosphere that fit together like a jigsaw puzzle and cover the entire surface of the Earth.
- **The movement and interactions** of these plates give rise to various geological phenomena, and fault lines are one such result.

- At fault lines, the Earth's crust can experience intense stress, leading to fractures or faults. When the **stress overcomes the strength of the rocks**, they can break and slip along these faults.
- This movement can result in earthquakes, as the accumulated stress is released as seismic energy.

**There are three main types of faults based on the movement of the blocks on either side of the fault:**

- **Normal Faults:** These occur when the hanging wall (the block above the fault) moves downward relative to the footwall (the block below the fault). Normal faults are associated with extensional tectonic forces.
- **Reverse Faults (Thrust Faults):** These occur when the hanging wall moves upward relative to the footwall. Reverse faults are associated with compressional tectonic forces.
- **Strike-Slip Faults:** These occur when blocks on either side of the fault move horizontally past each other. The San Andreas Fault in California is a well-known example of a strike-slip fault.
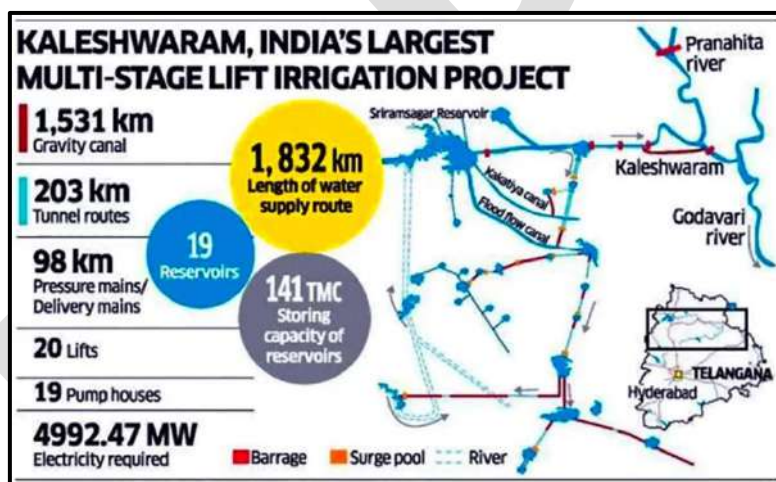
# Kaleshwaram Project

**Context**

- CM sends a strong signal on Govt's intentions on Kaleshwaram project lapses.

**Details**

- In the meeting on Sunday, the Chief Minister is said to have asked Engineer-in-Chief (ENC) of Telangana Irrigation and Command Area Development Department C Muralidhar to get the entire details on costs involved in the Kaleshwaram project.
- The refusal of L&T company to take up the repair works on the Medigadda barrage unless a new agreement is signed was discussed with the Chief Minister seeking details on how it was let go so easily from its responsibility.



**About Kaleshwaram project:**

- The Kaleshwaram Lift Irrigation Project, situated on the **Godavari River**, stands as one of the world's largest multi-purpose initiatives.
- Unveiled in June 2019, **its primary goal is to provide water for irrigation and drinking** across a staggering 45 lakh acres in 20 out of 31 districts in Telangana, encompassing vital urban areas like **Hyderabad and Secunderabad.**

**Project Objectives:**

- The project's primary objectives include ensuring **robust irrigation infrastructure** and catering to the burgeoning water demands for agricultural and urban consumption in the region.

**Phased Implementation:**

- The Kaleshwaram Lift Irrigation Project is being executed in phases, with the **first phase successfully inaugurated in June 2019.** The phased approach allows for systematic implementation and adaptability to evolving requirements.

**Financial Landscape:**

- The project's initial cost estimate stands at **Rs 80,000 crores, reflecting the monumental scale** of the endeavor. However, expectations indicate that the final cost upon completion might escalate to Rs 1 lakh crore, emphasizing the magnitude of investment required for this ambitious venture.

**Key Barrages:**

- Three key barrages, namely **Medigadda, Annaram, and Sundilla**, serve as crucial components of the project. These barrages facilitate the harnessing of water at the confluence of two rivers with Godavari, providing the foundational infrastructure for the project.

**Innovative Approach:**

- The uniqueness of the Kaleshwaram Lift Irrigation Project lies in its innovative design. Telangana plans to capture water at the confluence by **constructing a barrage at Medigadda**, then ingeniously reverses the flow through pumps, diverting it into the main Godavari River.
- The water is further channeled through an intricate system of lifts, pumps, reservoirs, tunnels, pipelines, and canals.

**Unprecedented Engineering Feat:**

- The project represents an unparalleled engineering feat, showcasing Telangana's commitment to harnessing water resources efficiently and sustainably.
- The complexity of its design and execution positions it as a global benchmark in the field of multi-purpose irrigation projects.

# India's First Winter Arctic Expedition

## Context

- India Initiates Historic Winter Expedition to Arctic, Elevating Himadri to Year-Round Research Station.

## Significance:

- With the launch of India's inaugural winter expedition to the Arctic, Himadri becomes the fourth research station in the region to operate year-round, marking a significant leap in India's polar research capabilities.

**Arctic Region and Its Global Impact:**

- **Geographical Location:** The Arctic Circle, situated north of latitude 66° 34' N, includes the expansive Arctic Ocean.
- **Climate Change Concerns**: Scientific studies underscore the Arctic's far-reaching impact on global sea levels and atmospheric circulations due to accelerating ice melt.
- **Rising Temperatures**: Over the past century, the Arctic has witnessed a substantial average temperature rise of 4 degrees Celsius.
- **Declining Sea Ice**: The Arctic sea ice extent is diminishing at a rate of 13% per decade, raising concerns about a potentially ice-free Arctic Ocean by 2040.

## India's Winter Expedition Plan:

- **Expedition Team:** A team of four scientists, backed by the Union Ministry of Earth Sciences, embarks on a month-long expedition from December 19, 2023, to January 15, 2024.
- **Research Areas**: The expedition will concentrate on atmospheric sciences, astronomy, astrophysics, climate studies, and more.
- **Himadri Station**: Serving as the base, Himadri, India's sole research station in Ny-Ålesund, positioned 1,200 kilometers from the North Pole, transforms polar night observations with collaboration from Norwegian agencies.
- **Special Preparations**: The expedition team is equipped to navigate the challenges of the Arctic, conducting groundbreaking research during the harsh winter conditions.

# Iceland Volcano Eruption

## Context

- In the vicinity of the Reykjanes Peninsula town of Grindavik, between Sýlingarfell and Hagafell, Iceland's capital saw a volcanic explosion.

## Details:

- Iceland is one of the most volcanically active regions on the planet. It witnesses an eruption every four to five years. However, since 2021, the frequency has spiked to almost one eruption per year.
- Lava flows from a volcano in Iceland were slowing down on Wednesday (December 20), although new vents could open at short notice, according to the Icelandic Meteorological Office.
- The volcano, which is known as **Fagradalsfjall and located on the Reykjanes peninsula in southwest Iceland**, erupted on Monday (December 18) after weeks of intense earthquakes and tremors.

## Geographical Features of Iceland

- **Location in the North Atlantic Ocean**: Iceland is situated in the North Atlantic Ocean, positioned directly south of the Arctic Circle.
- **Tectonic Setting on the Mid-Atlantic Ridge**: The country is located on the Mid-Atlantic Ridge, serving as the boundary between the North American and Eurasian tectonic plates.
- **Unique Terrain with 33 Active Volcanoes**: Iceland boasts a distinctive landscape characterized by lava fields, mountains, glaciers, geysers, and an impressive count of 33 active volcanoes—the highest number in Europe.
- **Historical Settlement by Norsemen**: The initial human settlement on Iceland dates back to 874 when Norsemen from Scandinavia established the first community, laying the foundation for the present capital city, Reykjavik.

## Recent Volcanic Activity on the Reykjanes Peninsula

- **Historical Dormancy and Recent Awakening:** For 800 years, the Reykjanes Peninsula remained dormant, devoid of any volcanic eruptions. However, a notable shift has occurred with the recent emergence of four eruptions within three years, signaling a new phase of volcanic activity.
- **Eyjafjallajokull Eruption of 2010**
  - **Massive Eruption Capturing Global Attention**: In 2010, the Eyjafjallajokull volcano underwent a colossal eruption that gained widespread international attention.
  - **Timeline and Far-reaching Effects**: The eruption, occurring in March and April of 2010, resulted in two distinct events. The consequential ash cloud disrupted air travel across continents, marking the longest disruption on the North Atlantic route since World War II. This disruption lasted for six days, impacting global travel significantly.

# Ionosphere

## Context

- The cold dark winters and the bright sunny summer of Antarctica hold a secret in the ionosphere that scientists have traced recently.

## Details:

- In addition to studying long-term seasonal ionospheric readings from Indian Antarctica station Bharati between 2010 and 2022, a group of scientists from the Indian Institute of Geomagnetism (IIG) have also looked at solar activity about the Sun's 11-year cycle.

## Overview of the Ionosphere:

- The ionosphere, spanning **100–1000 km in the upper atmosphere**, plays a crucial role in Earth's space weather dynamics.

## Magnetic Field Influence in Polar Regions:

- In Polar Regions, where magnetic field lines are vertical, the ionosphere becomes **exceptionally dynamic.**
- This unique characteristic makes it a **significant energy sink for space weather events and processes** within the **magnetosphere-ionosphere system.**
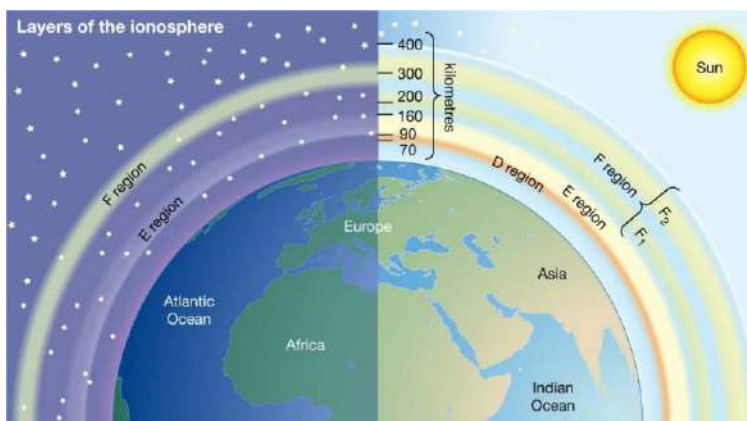


## The Intriguing Atmospheric Layer:

- Above the **mesosphere, thermosphere, and exosphere lies a fascinating layer**. This highly dynamic region of the atmosphere responds dynamically to solar radiation, expanding and contracting in a mesmerizing dance.

## Antarctic Ionospheric Insights:

- Despite its importance, Antarctica faces challenges in ionospheric measurement due to geographical limitations and a scarcity of monitoring stations.
- Consequently, the region has fewer recorded observations compared to its Arctic counterpart.

## 9.3    SNIPPETS



### Phreatomagmatic Eruption

- A phreatomagmatic eruption built a new island near Japan's Ogasawara Island group.
- It is a magmatic and hydrothermal eruption.
- It usually interacts explosively, resulting in the simultaneous ejection of steam and pyroclastic debris.
- The same mechanism produces phreatomagmatic ash in a wide range of basic and acidic compositions.
- It forms a blocky, homogeneous crust with a low vesicle content.

## 9.4    1 MAINS & 5 MCQs

*Q1. Discuss the significance of Polar Stratospheric Clouds (PSCs) in the Earth's atmosphere. Examine their role in the ozone depletion process and their connection to climate change. Also, analyze the potential implications of changing PSC characteristics on global environmental conditions.*

### Introduction:

- Polar Stratospheric Clouds (PSCs) are enigmatic formations that occur in the stratosphere, particularly in polar regions. These iridescent clouds play a crucial role in atmospheric processes, with profound implications for the Earth's environment. Understanding their significance is imperative in the context of atmospheric chemistry, ozone layer dynamics, and the broader

spectrum of climate change.

## Body:

### Role in Ozone Depletion:

- PSCs are intricately linked to the depletion of the ozone layer. The stratosphere hosts a delicate balance of ozone, and the presence of these clouds catalyzes chemical reactions that lead to the release of ozone-depleting substances.
- Notably, PSCs provide surfaces for heterogeneous reactions, facilitating the conversion of benign chlorine and bromine compounds into more reactive forms.
- This process amplifies the ozone destruction in polar regions, contributing to the infamous ozone holes observed primarily over Antarctica.

### Connection to Climate Change:

- Beyond their impact on ozone, PSCs also play a role in climate change dynamics. Their presence alters radiative balance, influencing temperature patterns in the stratosphere.
- As climate change intensifies, shifts in temperature and atmospheric circulation may influence the frequency and characteristics of PSCs.
- This interplay between PSCs and climate change raises concerns about the potential feedback loops that could exacerbate both ozone depletion and global warming.

### Implications of Changing PSC Characteristics:

- Changes in PSC characteristics, such as altered composition, size, or frequency, can have far-reaching consequences.
- These alterations may influence not only ozone levels but also atmospheric circulation patterns, weather systems, and regional climates.
- The cascading effects could extend to sea-level rise, extreme weather events, and disruptions in ecosystems. Therefore, understanding the evolving nature of PSCs is paramount for anticipating and mitigating the broader environmental impacts.

### Conclusion:

- Polar Stratospheric Clouds stand as intricate components of Earth's atmospheric dynamics, wielding a dual-edged sword with their contributions to ozone depletion and implications for climate change. As we navigate the complex interplay of atmospheric processes, a comprehensive understanding of PSCs becomes indispensable for devising effective strategies to address the challenges posed by ozone layer depletion and climate change. Only through concerted efforts in monitoring, research, and global cooperation can we hope to safeguard the delicate equilibrium of our planet's atmospheric systems.

........................................................................................

### Q2. Consider the following statements:

1. India signed the Svalbard Treaty in Paris in 1920.
2. 16 countries have set up permanent facilities at the International Arctic Research base in Ny-Ålesund.
3. India presently has three research stations at Antarctica namely 'Maitri', Himardri and 'Bharati'.

**Which of the above statements is/are incorrect?**

A) 1 and 3 only
B) 2 and 3 only
C) 3 only
D) 1, 2 and 3

### Q3. Consider the following statements about Polar Stratospheric Clouds (PSCs):

1. PSCs are found in the stratosphere, the second major layer of Earth's atmosphere.
2. These clouds play a crucial role in the depletion of the ozone layer by providing a surface for chemical reactions involving ozone-destroying compounds.
3. PSCs are commonly observed in equatorial regions.

**Which of the above statements is/are correct?**

A) 1 only
B) 2 only

C)  1 and 2 only
D)  2 and 3 only

### Q4. Consider the following statements regarding volcano eruptions:

1.  The Ring of Fire, an area in the Pacific Ocean basin, is known for its high seismic and volcanic activity.
2.  Pyroclastic flows, a deadly aspect of volcanic eruptions, consist of hot gas and volcanic materials moving rapidly down the slopes.
3.  Supervolcanoes, characterized by extremely large eruptions, have the potential to cause significant global climatic effects.

**Which of the above statements is/are correct?**

A)  1 only
B)  2 and 3 only
C)  1 and 2 only
D)  1, 2 and 3

### Q5. Consider the following statements regarding the ionosphere:

1.  The ionosphere is a region of Earth's upper atmosphere, extending from about 30 miles (48 km) to 600 miles (965 km) altitude.
2.  It plays a crucial role in radio communication as it reflects radio waves back to Earth, enabling long-distance communication.
3.  The ionosphere is primarily ionized by ultraviolet (UV) radiation from the Sun.

**Which of the above statements is/are correct?**

A)  1 only
B)  2 only
C)  1 and 3 only
D)  All of the above

### Q6. Consider the following statements about fault lines:

1.  Fault lines are fractures in the Earth's crust where rocks on either side have moved relative to each other.
2.  The point on the Earth's surface directly above the earthquake origin is known as the epicenter.
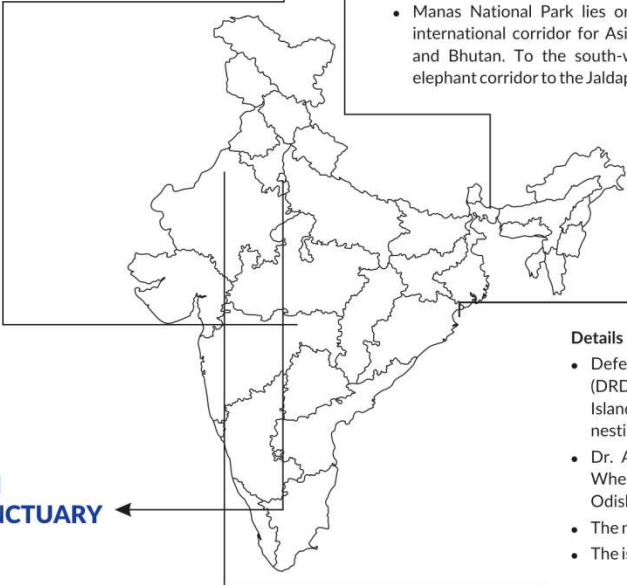3.  Transform fault lines are characterized by vertical movement along the fault.

**Which of the above statements is/are correct?**

A)  1 and 2 only
B)  2 and 3 only
C)  1 and 3 only
D)  All of the above

**ANSWERS: 2) B, 3) B, 4) D, 5) D, 6) A**

# 10. PLACE IN NEWS

## 10.1    IN INDIA

### PAINGANGA RIVER

**Details**

- Protests were staged against a proposed dam project on the Painganga River.
- The Painganga River is the chief river of the Buldhana district in Maharashtra.
- It rises in the Ajantha range and is a major tributary of the Wardha River.
- It flows along the state border between Maharashtra and Telangana.
- The Penganga River's tributaries include the Adan, Kas, Arunavati, Kayadhu, and Pus Rivers.
- It converges with Pus river near Mahur in Nanded.

### BUXA TIGER RESERVE

**Details**

- Three elephants were mowed down by a train in the Rajabhat Khawa area near Buxa Tiger Reserve.
- Buxa Tiger Reserve lies in Alipurduar district of West Bengal.
- Its northern boundary runs along the international border with Bhutan.
- The Sinchula hill range lies all along the northern side of BTR and the eastern boundary touches that of the Assam state.
- National Highway No.31 C roughly runs along its southern boundary.
- It is the easternmost extension of the extreme bio-diverse North-East India and represents highly endemic Indo-Malayan region.
- The fragile "Terai Eco-System" constitutes a part of this reserve.
- The Phibsoo Wildlife Sanctuary of Bhutan is contiguous to the north of BTR.
- Manas National Park lies on east of BTR. BTR, thus, serves as international corridor for Asian elephant migration between India and Bhutan. To the south-west, the Chilapata Forests form an elephant corridor to the Jaldapara Wildlife Sanctuary.

### WHEELER ISLAND

**Details**

- Defence Research Development Organisation (DRDO) will pause missile testing at Wheeler Island off Odisha coast during the mass nesting season of Olive Ridley Turtles.
- Dr. Abdul Kalam Island, formerly known as Wheeler Island, is an island off the coast of Odisha.
- The nearest port is Dhamra Port.
- The island is part of Bhadrak district.

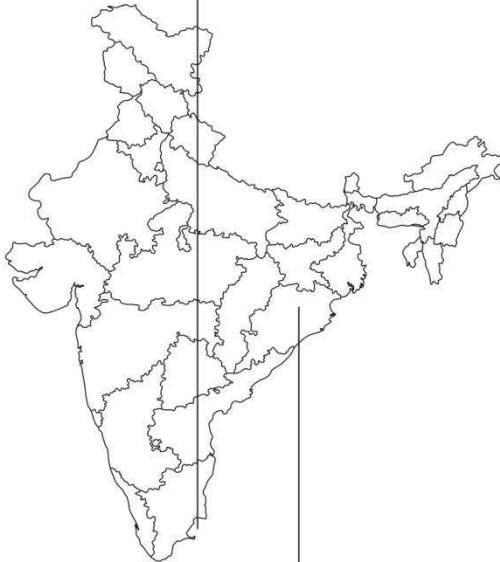### ASOLA-BHATI WILDLIFE SANCTUARY

**Details**

- Delhi HC expressed concern about 'risk' of holding event inside Asola Bhatti Wildlife Sanctuary.
- Asola-Bhati Wildlife Sanctuary is situated on the Southern Delhi Ridge of Aravalli hill range on Delhi-Haryana border.
- It lies in Southern Delhi as well as northern parts of Faridabad and Gurugram districts of Haryana state.
- Biodiversity significance of Ridge lies in its merger with Indo-Gangetic plains, as it is part of the Northern Aravalli leopard wildlife corridor.
- This protected area contains one of the last surviving remnants of Delhi Ridge hill range and its semi-arid forest habitat and its dependent wildlife.
- Historical places around the sanctuary are Surajkund and Anangpur Dam (both in Haryana), Tughlaqabad Fort and Adilabad ruins (both in Delhi), Chhatarpur Temple (in Delhi).
- It is contiguous to the seasonal waterfalls in Pali-Dhuaj-Kot villages of Faridabad and the sacred Mangar Bani.
- This is an important habitat for the Indian leopard.
- Endangered species in the sanctuary include red-headed vulture and Egyptian Vulture.
- Near-threatened species include painted stork, white-faced ibis and European roller. Rare birds include black francolin and grey-headed fish eagle.

### GHAGGA RRIVER

**Details**

- To spread awareness among public against throwing waste into the Ghaggar river, trans Ghaggar residents carried out a cleanliness drive at Chatt Puja Ghat of the river.
- The Ghaggar is an intermittent river in India, flowing during the monsoon rains.
- It originates in the Shivalik Hills of Himachal Pradesh and flows through Punjab and Haryana states into Rajasthan just southwest of Sirsa, Haryana and by the side of Talwara Lake in Rajasthan. This seasonal river feeds two irrigation canals that extend into Rajasthan.
- It eventually dries up in the Great Indian (Thar) Desert.
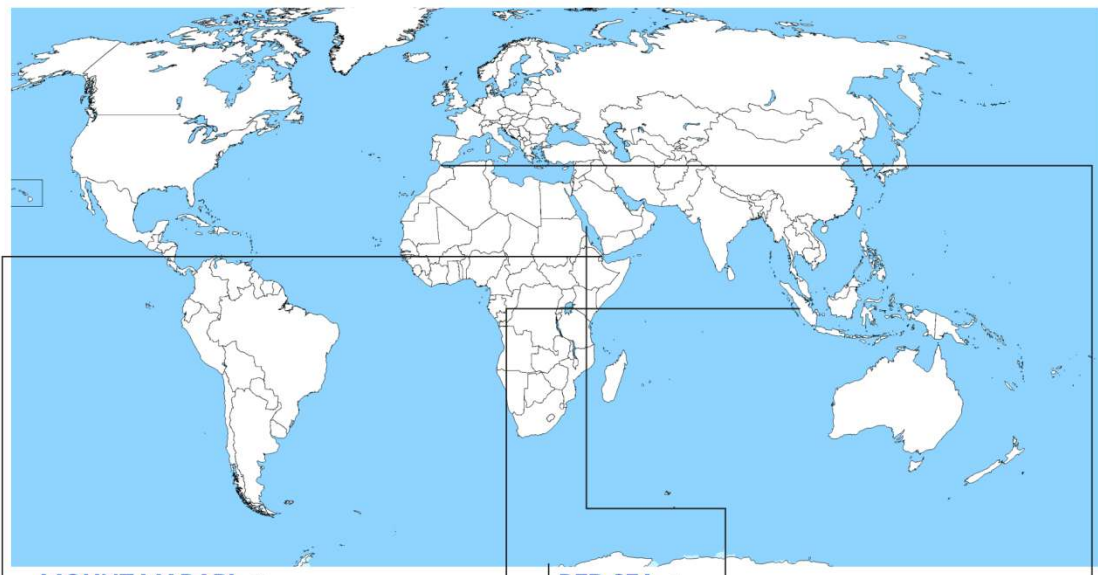
## 10.1    IN INDIA

### ENNORE CREEK

**Details**

- Contamination due to a recent oil spill from industries in Manali has brought down the bird population drastically at Ennore Creek.
- Ennore Creek is an ecologically sensitive area located along the northeastern coast of Tamil Nadu, India.
- Ennore Creek is situated near the Ennore Port in Chennai, along the Coromandel Coast in the Bay of Bengal.
- The creek is a vital estuarine ecosystem, serving as a habitat for diverse flora and fauna, including various species of fish, migratory birds, and mangroves.
- The Ennore region is marked by industrial development, including the Ennore Thermal Power Station and the Ennore Port.
- Industrial activities have led to environmental challenges such as pollution, habitat destruction, and disturbance to the natural balance of the ecosystem.

### SIMLIPAL TIGER RESERVE

**Details**

- Forest department personnel in Odisha arrested four poachers and two timber smugglers from Similipal Tiger Reserve (STR).
- STR is situated in the northern part of Odisha and spans across the Mayurbhanj district.
- It is part of the Eastern Ghats and covers an area of about 2,750 square kilometers.
- Simlipal is renowned for its diverse flora and fauna, including various endangered and endemic species.
- The reserve is home to a significant population of Bengal tigers, making it one of the important tiger habitats in India.
- The landscape of Simlipal is characterized by lush green forests, grasslands, and meadows.
- The reserve is known for its deciduous and tropical moist broadleaf forests, contributing to its rich ecological diversity.
- Simlipal is interspersed with numerous perennial rivers, providing a crucial source of water for the diverse wildlife within the sanctuary.
- Simlipal Tiger Reserve was designated as a national park in 1979 and later declared a tiger reserve in 1956 as part of Project Tiger, highlighting its importance for tiger conservation.
- Despite its protected status, Simlipal faces challenges such as habitat degradation, human-wildlife conflict, and poaching.
- Conservation efforts involve community participation, habitat restoration, and stricter anti-poaching measures.

### MOUNT MARAPI

**Details**

- The search for the 10 missing hikers on Mount Marapi resumed.
- The Marapi is a complex volcano in West Sumatra, Indonesia.
- The mountain is part of the Ring of Fire—a long, horseshoe-shaped, seismically active belt that rings the Pacific Ocean.

### BAB AL-MANDAB STRAIT

**Details**

- Houthi attacked in the Bab al-Mandab Strait.
- It is a strait that connects the Red Sea (northwest) with the Gulf of Aden and the Indian Ocean (southeast).
- It is located between Arabia (northeast) and Africa (southwest).
- It is an important strategic connection in the marine commerce route connecting the Mediterranean Sea to the Indian Ocean via the Red Sea and the Suez Canal.
- It is one of the world's most important seaborne commodity shipping routes, primarily for crude oil and petroleum.
- Yemen borders it on the Arabian Peninsula, and Djibouti and Eritrea border it on the African coast.

### RED SEA

**Details**

- A US warship and multiple commercial vessels were attacked in the Red Sea.
- The Red Sea is a seawater inlet of the Indian Ocean, lying between Africa and Asia.
- Its connection to the ocean is in the south, through the Bab el Mandeb strait and the Gulf of Aden.
- To its north lie the Sinai Peninsula, the Gulf of Aqaba, and the Gulf of Suez (leading to the Suez Canal).
- It is underlain by the Red Sea Rift, which is part of the Great Rift Valley.
- The Red Sea is the world's northernmost tropical sea, and has been designated a Global 200 ecoregion.
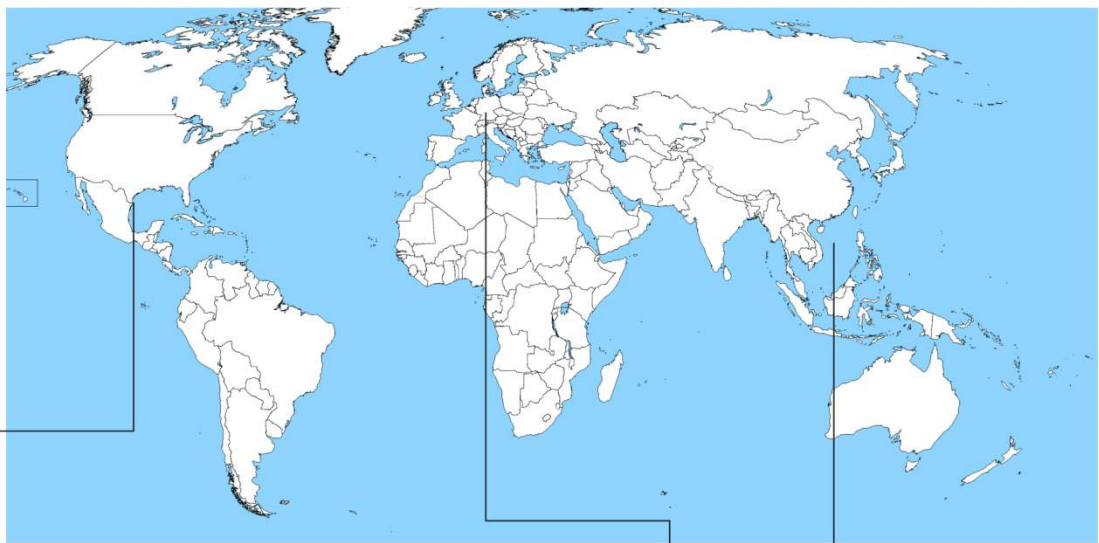
### STRAIT OF GIBRALTAR

**Details**

- Iran has threatened to close the Strait of Gibraltar unless Israel stops bombing Gaza.
- The Strait of Gibraltar is a narrow waterway that connects the Atlantic Ocean to the Mediterranean Sea, separating Europe from Africa.
- It is situated between the southern tip of the Iberian Peninsula (Spain and Gibraltar) and the northern tip of Morocco.
- Gateway between Continents: The strait serves as a natural gateway between Europe and Africa, facilitating maritime trade and navigation.
- Critical Chokepoint: It is one of the most strategically important chokepoints globally, controlling access to and from the Mediterranean.

### MOUNT VINSON

**Details**

- Shaikh Hassan Khan, a 36-year-old government employee from Kerala, has successfully ascended Mount Vinson, the highest peak in Antarctica.
- Mount Vinson is located in the remote Ellsworth Mountains of Antarctica. It lies within the southernmost continent, which is primarily covered by ice.
- Mount Vinson is the highest peak in Antarctica, standing at an elevation of approximately 16,050 feet (4,892 meters) above sea level.
- The mountain is part of the Ellsworth Range, which is a subrange of the larger Transantarctic Mountains. The Ellsworth Mountains are known for their challenging and icy terrain.
- Antarctica is governed by the Antarctic Treaty System, an international agreement aimed at preserving the continent for scientific research and preventing military activities.
- Mount Vinson is one of the Seven Summits, a mountaineering challenge that involves climbing the highest peak on each of the seven continents. Completing the Seven Summits is a notable achievement in the mountaineering community.

## 10.2    IN WORLD



### SARGASSO SEA

**Details**

- The Sargasso Sea is a region in the North Atlantic Ocean known for its distinctive floating seaweed, particularly Sargassum, and is important from the UPSC Prelims perspective for its unique ecological features.
- The Sargasso Sea is situated in the North Atlantic Ocean, bounded by ocean currents forming a circular pattern.
- Notable for the presence of Sargassum, a free-floating brown seaweed, forming dense mats on the ocean's surface.
- The Sargasso Sea is within the North Atlantic Subtropical Gyre, a large system of rotating ocean currents, which contributes to the accumulation of Sargassum in the area.
- The sea is influenced by major ocean currents, including the Gulf Stream, North Atlantic Current, and Canary Current, shaping its geographical features and ecological characteristics.
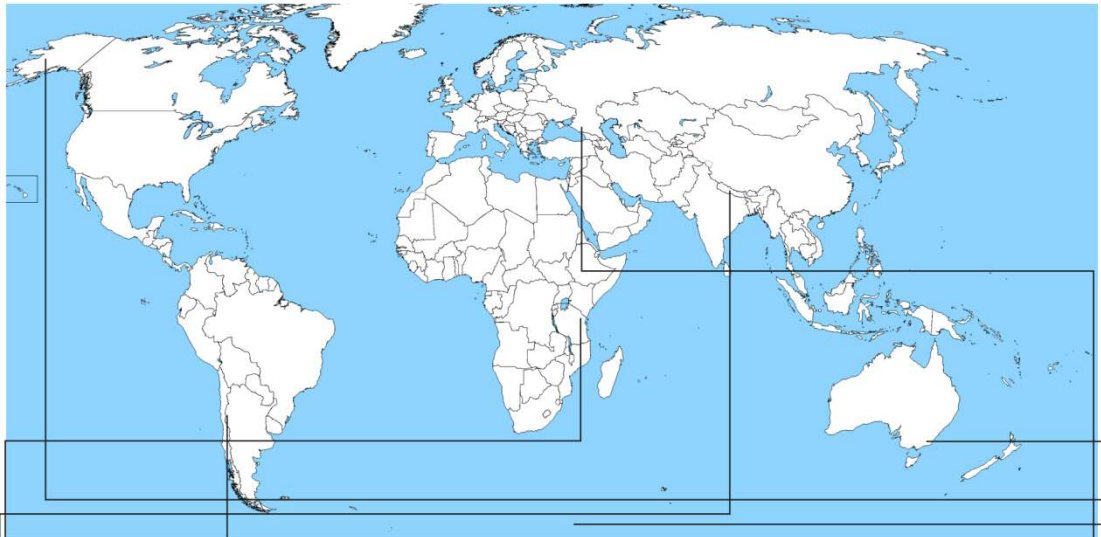
### RHINE RIVER

**Details**

- Parts of the river Rhine in Germany have been closed to shipping because of a rise in water levels following recent heavy rain, German authorities said on Thursday.
- The Rhine River is located in Western Europe, flowing through several countries, including Switzerland, Germany, Austria, Liechtenstein, France, and the Netherlands.
- It is approximately 1,230 kilometers long, making it one of the major rivers in the continent. The river's drainage basin covers a substantial part of Central Europe.
- The Rhine originates in the Swiss Alps, with its two primary tributaries, the Vorderrhein and Hinterrhein, meeting at Reichenau to form the Alpine Rhine.
- The river flows northward, passing through the Rhine Gorge in the Swiss Alps and the Rhine Valley in Germany. It then meanders through the Netherlands, forming the Rhine-Meuse-Scheldt delta before entering the North Sea.
- The Rhine is joined by various tributaries, including the Moselle, Main, and Neckar rivers, contributing to its overall flow.
- The river has historical geopolitical importance, serving as a natural boundary between countries and influencing trade routes and political boundaries.
- The Rhine is a vital economic corridor, facilitating transportation and trade. Major industrial and commercial centers are located along its banks.
- The river faces environmental challenges, including pollution, which has led to collaborative efforts among riparian countries to address water quality issues.

### SOUTH CHINA SEA

**Details**

- The South China Sea is a strategically vital maritime region bordered by several countries, including China, Vietnam, the Philippines, Malaysia, Brunei, and Taiwan.
- The South China Sea is a crucial waterway connecting the Pacific and Indian Oceans, facilitating a major portion of global maritime trade.
- Several nations, particularly China, Vietnam, the Philippines, and Taiwan, have territorial disputes over various islands and maritime zones within the South China Sea.
- The South China Sea is home to numerous islands, many of which are at the center of territorial disputes among neighboring countries.
- The United Nations Convention on the Law of the Sea (UNCLOS) governs maritime boundaries and resource rights. However, disputes in the South China Sea often challenge the principles outlined in UNCLOS.
- Islands like the Spratly and Paracel Islands are contested territories, with multiple claimants asserting their sovereignty. These disputes have led to heightened geopolitical tensions.
- Several countries, including China and the United States, maintain a military presence in the South China Sea, contributing to regional security concerns.
- The issue of freedom of navigation is significant, with FONOPS being conducted by various naval powers to assert the right to navigate through international waters without restrictions.
- The South China Sea faces environmental challenges, including overfishing, coral reef degradation, and pollution, impacting the marine ecosystem.

## SEVEN SUMMITS

**Details**

- The Seven Summits refers to the highest peak on each of the seven continents. Climbing all Seven Summits is considered a significant mountaineering challenge and accomplishment. Here are the Seven Summits:

### 1. MOUNT EVEREST (ASIA)

**Details**

- Location: Himalayas, Nepal/China
- Elevation: 29,032 feet (8,848 meters)
- Continent: Asia

### 2. ACONCAGUA (SOUTH AMERICA)

**Details**

- Location: Andes, Argentina
- Elevation: 22,841 feet (6,961 meters)
- Continent: South America

### 3. DENALI (NORTH AMERICA)

**Details**

- Location: Alaska, USA
- Elevation: 20,310 feet (6,194 meters)
- Continent: North America

### 4. MOUNT KILIMANJARO (AFRICA)

**Details**

- Location: Tanzania
- Elevation: 19,341 feet (5,895 meters)
- Continent: Africa

### 5. MOUNT ELBRUS (EUROPE)

**Details**

- Location: Caucasus, Russia
- Elevation: 18,510 feet (5,642 meters)
- Continent: Europe

### 6. VINSON MASSIF (ANTARCTICA)

**Details**

- Location: Ellsworth Mountains, Antarctica
- Elevation: 16,050 feet (4,892 meters)
- Continent: Antarctica

### 7. MOUNT KOSCIUSZKO (AUSTRALIA)

**Details**

- Location: Snowy Mountains, Australia
- Elevation: 7,310 feet (2,228 meters)
- Continent: Australia

(Note: Some lists replace Mount Kosciuszko with Puncak Jaya in Oceania, making it the highest peak in Australasia.)

## 10.3    MCQs

**Q1.** *Simlipal Tiger Reserve, a crucial conservation area in India, serves as a sanctuary for diverse wildlife. What is its primary ecological significance?*

A) Preservation of unique geological formations
B) Fossil-rich archaeological sites
C) Biodiversity hotspot and tiger conservation
D) Vital water catchment area for the region

**Q2.** *In the intricate tapestry of South China Sea geopolitics, which submerged geological feature has been a persistently disputed flashpoint, entailing intricate claims by several nations and exacerbating regional complexities?*

A) Palawan Trench
B) Macclesfield Bank
C) Sulu Sea Trench
D) Java Trench

**Q3.** *Ennore Creek, a significant coastal feature, is often in focus due to environmental concerns. What is its primary role?*

A) Oil and natural gas exploration
B) Critical maritime trade route
C) Ecosystem preservation and flood control
D) Historical archaeological site

**Q4.** *The Red Sea, with its strategic importance, is bordered by several nations. What unique geological feature separates the Red Sea from the Gulf of Aden?*

A) Bab el Mandeb
B) Strait of Gibraltar
C) Hormuz Strait
D) Malacca Strait

**Q5.** *Navigating through multiple European countries, the River Rhine plays a pivotal role in the continent's geography. Which prominent European mountain range does the Rhine flow through, contributing to its unique course?*

A) Pyrenees
B) Apennines
C) Carpathians
D) Alps

**ANSWERS: 1) C, 2) B, 3) C, 4) A, 5) D**