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# AS ITS CHANGING

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- Typical Viewpoint 2025



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06.02.2025

## Why **temperatures at North Pole** reached **20 Celsius above average**

- ▽ Temperatures at the North Pole increased to more than 20 degrees Celsius above average on February 2, crossing the threshold to melt ice, during the depths of the **polar winter (which is from November to February).**
- ▽ “This was a very **extreme winter warming event**... Probably **not the most extreme ever observed**, but still at the upper edge of what can happen in the Arctic,” Mika Rantanen, a scientist at the Finnish Meteorological Institute, told The Guardian.
- ▽ **Since 1979**, the Arctic has warmed **four times faster than the global average**.
  - This is a problem since the region acts as a refrigerator for the rest of the planet, keeping things cool.
  - Severe consequences can take place if temperatures continue to soar at this rate, from a rise in sea levels to the disruption of global weather patterns.

## Why did the North Pole experience such high temperatures?

- ▽ The **unusually high temperatures at the North Pole**
  - were the product of a deep low-pressure system –  
a region where the atmospheric pressure is lower than that of surrounding locations – over Iceland.
  - The system opened gates for the **arrival of warmer air from lower latitudes**, effectively bringing heat to the region.
- ▽ Another factor was
  - really hot sea surface temperatures in the **north-east Atlantic**,  
which further intensified the wind-driven warming.
- Absolute temperatures at the North Pole reached more than negative one degree celsius on February 2.

## Why has the Arctic warmed faster than the global average?

- ▽ The **global temperatures** have increased by around **1.3 degrees Celsius** compared to the **1850-1900 baseline**.
- The **Arctic**, however, has warmed **3.8 times faster than the global average** *since the late 1970s*, according to a 2022 study published in the journal Communications Earth and Environment.

That means Arctic warming is almost 3.8 times of the average Global temperatures warming

### ▽ There are multiple reasons for this.

↔ One of the most prominent factors is the **albedo effect** or *how much sunlight a surface reflects*.

- Sea ice keeps temperatures down in the polar regions, with its bright, white surface reflecting more sunlight to space than liquid water.
- **But as the Arctic's ice cover is melting, more land or water is getting exposed to the Sun, and as a result, more heat is getting absorbed.** This causes warming.

↔ The **lack of convection in the higher latitudes** *is another reason for the Arctic warming faster than other parts of the world*.

- Convection occurs when air close to the ground is heated by the warm surface of the Earth.
  - **In the tropics**, where more sunlight can reach the surface compared to the Arctic, **strong convection takes place, causing warm air to rise.**
  - **This vertical mixing distributes heat throughout the atmosphere.**
- That is not the case in the Arctic.
  - Due to weak convection in the region, **the extra warming from the greenhouse gases is not able to mix vertically and the heat remains concentrated near the surface.**

**08.02.2025**

### **FORWARD CONTRACTS IN FOCUS**

**FORWARD TRADING** in government securities involves entering into a contract to buy or sell these securities at a predetermined price on a specified future date

**THIS DERIVATIVE** derivative product allows market participants to hedge against interest rate fluctuations or to speculate

on future price movements of G-secs

**RBI HAS BEEN** expanding the suite of interest rate derivative products... Products such as Interest Rate Options, Interest Rate Futures, Interest Rate Swaptions and Forward Rate Agreements are available to market participants



## **What is a Forward Contract?**

- ▽ A forward contract is a customized contract between two parties to buy or sell an asset at a **specified price on a future date**.
- ⇒ A forward contract **can be used for hedging or speculation**, although its non-standardized nature makes it particularly apt for hedging.

### **KEY TAKEAWAYS**

- A forward contract is a **customizable derivative contract** between two parties to buy or sell an asset at a specified price on a future date.
- Forward contracts can be tailored to a **specific commodity, amount, and delivery date**.
- Forward contracts do not trade on a centralized exchange and are considered over-the-counter (OTC) instruments.
- For example, forward contracts can help producers and users of agricultural products hedge against a change in the price of an underlying asset or commodity.
- Financial institutions that initiate forward contracts are exposed to a greater degree of settlement and default risk compared to contracts that are marked-to-market regularly.
- Commodities traded can be **grains, precious metals, natural gas, oil, or even poultry**.
- A forward contract settlement can occur on a **cash or delivery basis**.

## **Forward Contracts vs. Futures Contracts**

- ▽ Both **forward and future contracts** involve the agreement to buy or sell a commodity at a set price in the future.
  - But there are slight differences between the two.

While a forward contract does not trade on an exchange, a futures contract does.

Settlement for the forward contract takes place at the end of the contract, while the futures contract settles on a daily basis.

Futures contracts exist as standardized contracts that are not customized between counterparties.

## **Hedging**

- ⇒ Hedging is a risk management strategy employed to offset losses in investments by taking an opposite position in a related asset.
- ⇒ The reduction in risk provided by hedging also typically results in a reduction in potential profits.
- ⇒ Hedging requires one to pay money for the protection it provides, known as the premium.
- ⇒ Hedging strategies typically involve derivatives, such as options and futures contracts.

## **Understanding Hedging**

- ⇒ The best way to understand hedging is to think of it as a form of insurance.
- ⇒ When people decide to hedge,

they are **insuring themselves against a negative event's impact on their finances.**

This **doesn't prevent all** negative events from happening.

However, if a negative event does happen and you're properly hedged, the **impact of the event is reduced.**

- **In practice, hedging occurs almost everywhere.**

For example, **if you buy homeowner's insurance, you are hedging yourself against fires, break-ins, or other unforeseen disasters.**

- Hedging against investment risk means strategically using financial instruments or market strategies to offset the risk of any adverse price movements.

Put another way, investors hedge one investment by making a trade in another.

In the stock market,  
hedging is a way to get portfolio protection—  
and protection is often just as important as portfolio appreciation.

## **DUNKI**

### **Journeys that India's undocumented migrants undertake to reach the US via multiple countries**

These illegal “dunki routes” for reaching the US have been utilised by people from *Punjab and Haryana* and are now finding takers from other states, too.

#### **Via South America**

- ▽ The first step in the *most popular dunki route from India* is to reach South America.
  - Countries such as **Ecuador, Bolivia, and Guyana** have **visas on arrival** *for Indian citizens*.
  - *A migrant's route also depends on the links that his “agent” has with human trafficking networks*, but the process can be long.
  - Agents charge between **Rs 30-40 lakh to Rs 1 crore** per person and usually take the sum before the migrants reach the US.
- ▽ One woman aboard the US military plain said she travelled with her 10-year-old son.

“We were **flown to** Medellin in **Colombia**  
and

**kept there** for nearly **two weeks**

before being **moved to San Salvador** (capital of **El Salvador**) in a **flight**.

From there, we **walked** for over **three hours to Guatemala**,

then travelled by **taxis** to the **Mexican border**.

After **staying in Mexico** for **two days**,

we **finally crossed over to the US**”.

- ▽ Some agents arrange a *direct visa for Mexico from Dubai*.
  - However, landing directly in Mexico is considered more dangerous, in terms of the threat of arrest by local authorities.

- Most land in a Latin American country and are then taken to Colombia.

## Perilous journey to Mexico

- ▽ From **Colombia**, the migrants *enter Panama*.

This involves crossing the **Darien Gap**,

a *dangerous forest between the two countries*, with risks of wild animals and criminal gangs.

Migrants can face robbery and rape, with crimes committed here going unreported.

If everything goes well, the journey takes eight to 10 days.

If a migrant dies, there is no way to send the body home for last rites.

- ▽ **Guatemala** is a big coordination centre on this route.

Migrants are handed over to new traffickers here, to *enter Mexico* and continue the *journey towards the US border*.

## Risks at every turn

- ▽ Another route from Colombia starts from San Andres but is not much safer.
  - From San Andres, migrants take boats to Nicaragua in Central America.
  - Fishing boats with migrants go to Fisherman's Cay, around 150km from San Andres.
  - From there, migrants are transferred onto another boat to Mexico.
- ▽ The 3,140-km *border separating the US and Mexico has fencing, which the migrants jump across.*
  - Many choose to cross the dangerous **Rio Grande river**.
    - After crossing over, migrants are detained and then kept in camps.
    - Their fate then depends on whether US authorities find them fit for asylum.



## FAVOURED 'DUNKI' ROUTES

### VIA CANADA

- Agents acquire a valid visa for Canada on forged university admission or work permit
- The donkey stays in cold border areas of Canada for a few months
- At an opportune time, the agent sends them across the border—barely a kilometre walk

**Cost: ₹80 lakh**

### VIA TURKEY

- Agents obtain a UK visa on a work permit, basis which the traveller enters Turkey with an e-visa and lives there for 90 days
- In this period, they fly into a safe Central American country, where they stay for a week to a year
- At an opportune time, the agents move them into the US

**Cost: ₹80-90 lakh**



### VIA LATIN AMERICAN AND AFRICAN COUNTRIES

- Agents fly the immigrant to Dubai, Indonesia or Malaysia as a springboard on a valid tourist visa
- Some even fly them to African countries where they cool off for a few months. From there, they charter flights to Latin American

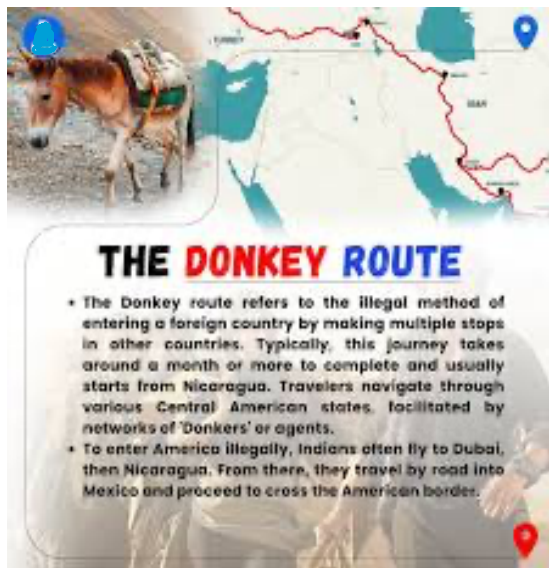
countries such as Bolivia, Guyana, Ecuador, Nicaragua. These countries allow on-arrival visas

- The person traverses harsh terrains to reach Mexico on foot through forests or water routes

**Duration:** Average six months before they reach the US

**Cost: ₹70-75 lakh**





**10.02.2025**

## **What is South Africa's new land law that Trump finds 'immortal'?**

- ▽ United States President Donald *Trump* has *signed* an *Executive Order* **ending financial assistance** to *South Africa* for its *alleged* **"unjust and immortal practices"** that include
- the enactment of a **new domestic land law**, and
  - taking "aggressive positions" against the **US and Israel** at the **International Court of Justice** and
  - "reinvigorating its relation with **Iran**".

## **New Expropriation Act**

- ▽ On January 24, South Africa implemented the **new Expropriation Act**,

which allows the state to seize land **without compensation** for public purposes or in public interest in certain circumstances.

- ▽ The law, which was discussed for five years, ~~including public consultations~~, provides a legal framework for expropriation by the state in accordance with Section 25(2) of the South African constitution.
- ▽ In most cases, the expropriating authority is required to negotiate with the property owner for an agreement before resorting to expropriation.

- A day after Trump's social media post, Ramaphosa clarified on X that the "Expropriation Act is not a confiscation instrument, but a constitutionally mandated legal process that ensures public access to land in an equitable and just manner as guided by the constitution".

## Wrongs of apartheid era

- ▽ The need for the new law, which repealed and replaced the **apartheid-era Expropriation Act of 1975**, arose from the highly skewed pattern of land ownership in South Africa.
- ▽ According to research, when racist minority rule over South Africa ended in **1994**,
  - **about 86% of agricultural land** was controlled by **white people**, who constituted **10.9% of the population**.
- ▽ The needle has not moved much in the three decades since – a land audit from **2017**, the most recent available, showed that **white people still owned 72%** of agricultural landholdings.
  - Today, **whites** are only about **7% of South Africa's 62 million population**.
- ▽ Under the **1975 Act**, the state was obligated to pay owners to seize their lands under the **principle of "willing seller, willing buyer" (WSWB)**, which delayed the process of land redistribution.
  - The WSWB principle allowed owners to sell to the highest bidder on the open market, effectively protecting their racial preferences.
- ▽ Also, the "willingness" of the buyer alone was not enough, and while the state was free to intervene, it did not offer to act as an agent for the buyer,
- ▽ Land reforms to address this situation, including the new Expropriation Act, is part of the **South Africa National Development Plan 2030**, which aims to eliminate poverty and reduce inequality.
- ▽ The new law has faced resistance from the **white-dominated Democratic Alliance (DA) party**, the second largest in the ruling coalition.
  - The DA has *accused* Ramaphosa's African National Congress of *not consulting its coalition partners* on the law, and has criticised it as being unconstitutional.

## Trump, the US, and SA

- ▽ Trump had taken up the alleged violence against white South Africans during his previous term (2017-21) as well.
  - In August 2018, after Fox News ran a segment on the South African government's plan to redistribute land to black people who had been dispossessed during apartheid,

- Trump tweeted about “farm seizures and expropriation and the large scale killing of farmers” in that country.
- ▽ However, the relationship between South Africa and the US had been developing strains even before Trump returned to the Oval Office.
  - Pretoria has been cultivating ties with Russia and Iran in recent years, and in December 2023, it instituted a case against Israel, the closest ally of the US, in the International Court of Justice, claiming genocide against Palestinians in Gaza.

### LAND ACQUISITION IN US & INDIA

■ In the US, land acquisition has gradually moved towards encouraging private investment, with the intent to boost economic growth.

■ In *Kelo v. City of New London* (2005), the US Supreme Court ruled that efforts to acquire property to

facilitate private economic development would fulfil the “public use” requirement.

■ In response, several states, such as Alabama, Delaware, and Texas passed laws restricting the use of eminent domain to acquire private property.

■ In India, several laws detail land acquisition provisions in specific cases, including the construction of highways, atomic energy plants, and the preservation of national monuments.

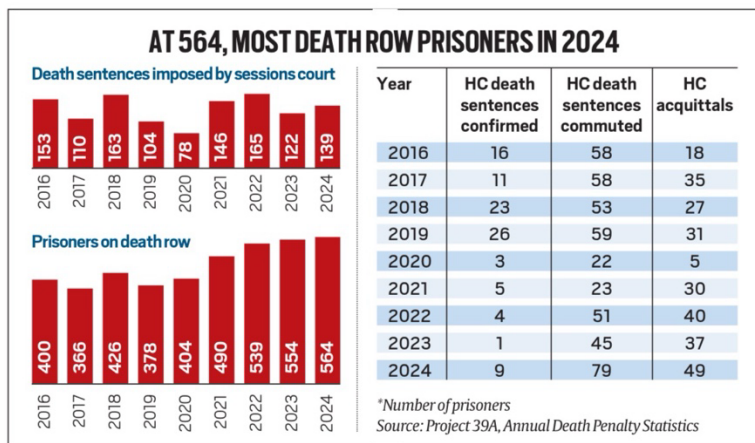
■ For more than a century, however, the subject was governed by the Land Acquisition Act, 1894, which allowed the government to acquire land for “a public purpose” in exchange for compensation to the landowner. However, this did not address the concerns of affected families other than the landowner.

■ In 2013, the Right to Fair Compensation and Transparency in Land Acquisition, Rehabilitation and Resettlement Act came into force to establish a “humane, participative, informed and transparent process for land acquisition”.

■ Besides compensating landowners, the Act requires authorities to conduct a Social Impact Assessment to determine who will be affected by the acquisition, with provisions on compensation, rehabilitation and resettlement.



**11.02.2025**



In 2024, of the 139 death sentences awarded by trial courts, 87 (62%) were imposed in murder cases and 35 (25%) in cases of murder involving sexual offences. This is a reversal from previous year, when more death sentences were imposed in cases of murder involving sexual offences (59) than in just murder cases (40).

↔ Death sentence comprising of

- 1) Murder + Sexual offence (number has been reduced on comparison)
- 2) Murder only

**13.02.2025**

## **EINSTEIN RING**

A ring of light that forms around a massive celestial body, an example of **gravitational lensing**

- ▽ The *European Space Agency (ESA's)* **Euclid space telescope** has discovered an Einstein ring around a galaxy some 590 million lightyears from Earth.
  - Photos of the Einstein ring, *taken by Euclid in September 2023 but released on Monday*, show a ball of light (the galaxy NGC 6505) with a bright, cloud ring around it.

## What is an Einstein ring?

▽ An Einstein ring

is a ring of light

that may form around

dark matter,  
a galaxy, or  
a cluster of galaxies.

○ It is essentially an **example of gravitational lensing.**

a phenomenon which occurs

when a massive celestial body  
creates a gravitational field

which **distorts and amplifies** the light from distant galaxies  
that are behind it but in the same line of sight.

**The body causing the light to curve is called a gravitational lens.**

▽ In the case of the recently discovered Einstein ring, NGC 6505 was the gravitational lens which distorted and amplified the light coming from a distant unnamed galaxy, located 4.42 billion light-years away. **A light-year (roughly 9.46 trillion km) is the distance light travels in one year.**

▽ Einstein rings are named after Albert Einstein, whose **theory of general relativity** predicted that **light could bend and brighten around objects across the cosmos.**

○ Several Einstein rings have been discovered since 1987, although it remains unclear how many such rings exist in total.

○ Experts suggest that **these are extremely rare**, with **less than 1% galaxies having an Einstein ring.**

▽ Notably, these rings can only be observed using powerful space telescopes such as Euclid.

## Why study Einstein rings?

▽ Einstein rings help scientists investigate **dark matter**, which has **never been detected but is believed** to **make up 85% of all matter in the universe.**

○ “This dark matter does not interact with light, but it does have a gravitational effect... Gravitational lensing therefore is sensitive to the presence of this dark matter, **allowing us to indirectly detect it.**”

- ▽ Moreover, Einstein rings **enable scientists to learn about distant galaxies**, which otherwise might not be visible.
- ▽ They can also provide **information about the expansion of the universe** *as the space between the Earth and other galaxies* – both in the foreground and the background – is stretching, according to NASA.

#### THE FOREIGN AIRCRAFT PARTICIPATING IN AERO INDIA

## Big birds take to the skies

5th-gen US & Russian fighters are on display at the same platform for the 1st time. But they aren't the only foreign aircraft drawing eyeballs. Here's a list:



**F-35 LIGHTNING II**  
(US)

■ This fifth-generation fighter is considered the backbone of the US Air Force. Developed by Lockheed Martin, it is known for its air superiority, ground attack capabilities and electronic warfare. It is one of the world's most advanced fighter jets. Its software and hardware upgrades, including AI-powered combat systems, have been a gamechanger.



**SUKHOI SU-57**  
(RUSSIA)

■ The Su-57E is a fifth-generation stealth fighter developed by the Russian company Sukhoi. It is considered the rival of the F-22 Raptor and the F-35 Lightning II of the US. Known for its speed, the Su-57E has a range of over 3,500 km. Russia is aiming to produce more of these aircraft, which have AI-assisted combat systems, sensor fusion and electronic warfare capabilities. Russia has also shown interest in exporting these fighters to India and China.



**F-16 FIGHTING FALCON**  
(US)

■ The F-16 Fighting Falcon is a multi-role fighter manufactured by Lockheed Martin for the US Air Force. It is known for its agility, speed and advanced avionics. It is also one of the most widely exported fighter jets, with shipments to more than 25 countries. It can carry air-to-air and air-to-ground missiles and bombs, as well as a 20-mm cannon. The US has also supplied F-16s to Ukraine.



**EMBRAER C-390**  
**MILLENNIUM (BRAZIL)**

■ The Embraer C-390 Millennium is a military transport aircraft built by Embraer of Brazil. Designed to replace older turboprop planes, it offers higher speed, greater payload and advanced avionics. Often compared to the C-130J Super Hercules, it is operated by the Brazilian Air Force and has orders from Portugal, Hungary and the Netherlands.



**JAS 39 GRIPEN**  
(SWEDEN)

■ The Saab JAS 39 Gripen is a fourth-generation multi-role fighter developed by Sweden's Saab Group. A rival of the Rafale, the F-16 and the Eurofighter Typhoon, it is known for its agility, advanced avionics and cost-effectiveness. It is used by the Swedish Air Force and exported to countries such as Brazil, Hungary, Czech Republic, Thailand and South Africa.



**AIRBUS A330 MRTT**  
(USED BY 15 NATIONS)

■ The Airbus A330 MRTT (multi-role tanker transport) is an air-to-air refuelling and transport aircraft developed by Airbus. It can carry troops, tankers, and large amounts of materiel. It is used by over 15 countries, including the UK, Australia, Germany and France. It can act as a supporter for fighter jets and bombers due to its wide operational ability.

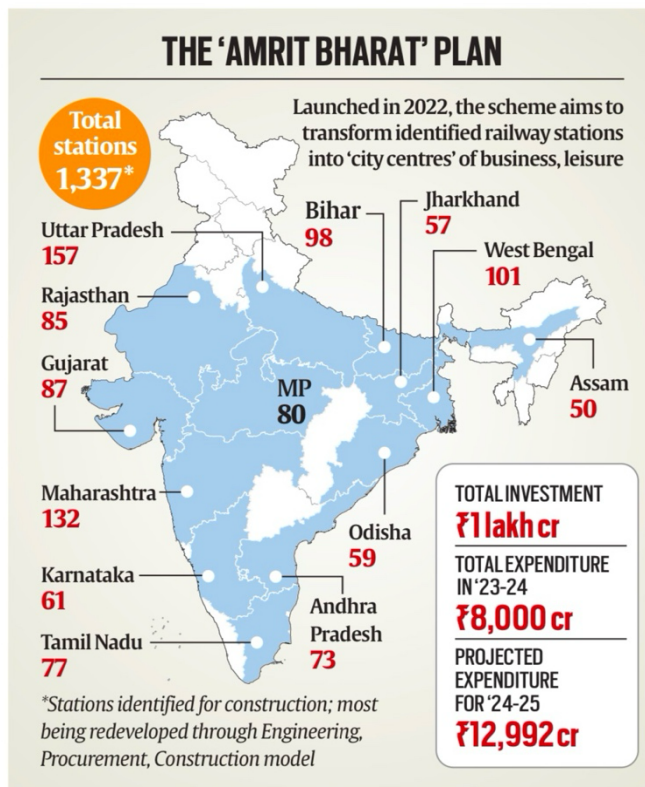


**AIRBUS A400M ATLAS**  
(GERMANY)

■ The largest aircraft at Aero India 2025 is Airbus A400M Atlas, a military transport plane operated by the German Air Force. The A400M has a payload of 37 tonnes and is faster than a traditional transport plane. It can carry choppers and armoured vehicles, and run on unprepared runways.

**REPORT AND PHOTOS**  
**BY KIRAN PARASHAR**

**14.02.2025**



## **HIGH ENERGY NEUTRINO DETECTED UNDER MEDITERRANEAN SEA: STUDY**

- ▽ A neutrino detector submerged in the Mediterranean Sea has sniffed out the **most energetic ghost particle yet**, *30 times more active than the previous record-holder*.
  - Scientists believe *it came from outside the Milky Way*.
- ▽ Neutrinos are **produced by stars, supernovae, cosmic rays, and radioactive decay**.
  - Their **near-zero mass** earns them the 'ghost particle' moniker.
  - They **seldom react with matter** – **trillions of neutrinos pass through our body every second.**
- ▽ This also makes it **very difficult to spot them**.
  - Neutrino **detectors are located underwater, deep underground, or in polar ice.**
  - They try to record the extremely rare instances of neutrinos colliding with matter. The latest finding was by a detector still under construction.
- ▽ Scientists **study neutrinos to understand how the universe was created, and how it is held together.**



▽ “This is part of trying *to understand the highest-energy processes in the universe*”.

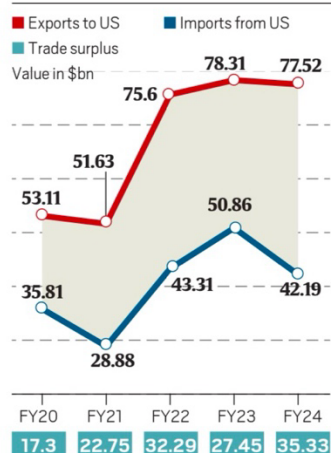
### Quick Notes :-

- > The neutrino is tiny, neutral, and weighs so little that no one has been able to measure its mass.
  - > Neutrinos are the most abundant particles that have mass in the universe.
  - > Every time atomic nuclei come together (like in the sun) or break apart (like in a fission reactor or particle accelerator), they produce neutrinos.
  - > Even a banana emits neutrinos—they come from the natural radioactivity of the potassium in the fruit.
  - > Once produced, these ghostly particles almost never interact with other matter.
  - > Tens of trillions of neutrinos from the sun stream through your body every second, but you can't feel them.
- 
- Scientists named the three types of neutrinos they have discovered so far for the other matter particle they interact with:
    - 1) the electron neutrino,
    - 2) muon neutrino, and
    - 3) tau neutrino.
  - Neutrinos change between types as they travel, something scientists call neutrino oscillation.
-

15.02.2025

## Modi's first visit to New Trump

### INDIA'S GOODS TRADE SURPLUS WITH US DOUBLED IN 5 YEARS



Source: Commerce and Industry Ministry

### TOP 5 IMPORTS FROM US \*

\*Comprise 60% of total imports from US (2023-24)

| Items                         | Value (\$bn) |
|-------------------------------|--------------|
| Mineral fuels & oils          | 12.96        |
| Precious, semiprecious stones | 5.16         |
| Nuclear reactors, boilers     | 3.75         |
| Electrical machinery          | 2.3          |
| Aircraft and parts            | 2.25         |

### TOP 5 EXPORTS TO US \*\*

\*\* comprise 67% of total exports to US (2023-24)

| Items                     | Value (\$bn) |
|---------------------------|--------------|
| Engineering goods         | 17.62        |
| Electronic goods          | 10.49        |
| Gems and jewellery        | 9.9          |
| Drugs and pharmaceuticals | 8.72         |
| Petroleum products        | 5.83         |

### INDIA'S RISING DEPENDENCE ON U.S. MARKET



Source: Commerce and Industry Ministry

\* % share in over all exports

### INDIA'S TOP 5 CRUDE OIL SUPPLIERS

#### SUPPLY VOLUME (mn tn)\*

|              |               |
|--------------|---------------|
| Russia       | 82.03 (37%)   |
| Iraq         | 45.77 (20.6%) |
| Saudi Arabia | 28.79 (13%)   |
| UAE          | 18.63 (8.4%)  |
| US           | 7.17 (3.2%)   |

#### TOP 5 LNG SUPPLIERS

##### SUPPLY VOLUME (mn tn)\*

|         |              |
|---------|--------------|
| Qatar   | 9.82 (38.8%) |
| US      | 5.12 (20.2%) |
| UAE     | 2.84 (11.2%) |
| Angola  | 1.97 (7.8%)  |
| Nigeria | 1.36 (5.4%)  |

Market Share in % \*Jan-Nov '24  
Source: Ministry of Commerce and Industry

# Note of caution: what bilateral trade deal with US could mean for India

| TABLE 1<br>TOP IMPORTS FROM THE US                                 |       | TABLE 2<br>TARIFF DIFFERENTIAL WITH US (%PP, WEIGHTED AVG, 2022) |       |
|--------------------------------------------------------------------|-------|------------------------------------------------------------------|-------|
| Top 5 items that comprise 60% of India's imports from US (2023-24) |       | Top 5 items that comprise 67% of India's exports to US (2023-24) |       |
| Items                                                              | Value | Items                                                            | Value |
| Mineral fuels & oils                                               | 12.96 | Engineering goods                                                | 17.62 |
| Precious, semi precious stones                                     | 5.16  | Electronic goods                                                 | 10.49 |
| Nuclear reactors, boilers                                          | 3.75  | Gems and jewellery                                               | 9.9   |
| Electrical machinery                                               | 2.3   | Drugs and pharmaceuticals                                        | 8.72  |
| Aircraft and parts                                                 | 2.25  | Petroleum products                                               | 5.83  |
|                                                                    |       | Value in \$billion                                               |       |

| Products        | India | China | Canada | Mexico | Vietnam |
|-----------------|-------|-------|--------|--------|---------|
| Animal          | 30.2  | 9.3   | 29.3   | 28.9   | 9.4     |
| Chemical        | 10.2  | 2.4   | 0      | 3.3    | 1.2     |
| Footwear        | 17.2  | -5.8  | 0      | 11.9   | -8.9    |
| Fuels           | 6.8   | 2.6   | 0      | 0      | 0       |
| Hides and skins | 3.0   | -4.6  | 0.3    | 4.7    | -6.4    |
| Machinery       | 6.0   | 1.1   | 0      | 0      | 2.0     |
| Metals          | 7.8   | 1.7   | 0      | 5.0    | 0.6     |
| Minerals        | 8.6   | 0.7   | 0      | 0      | 0.6     |
| Vegetables      | 20.5  | 13.2  | 0.2    | 10.5   | 4.3     |
| Transportation  | 14.4  | 9.8   | 0      | 6.9    | 4.0     |

1pp = percentage points. Source: Ministry of Commerce and Industry, WITS, Emkay Research

⇒ Prime Minister Narendra Modi and United States President Donald Trump have announced plans to negotiate the first tranche of a mutually beneficial, multi-sector Bilateral Trade Agreement (BTA) this year, and to double bilateral trade to \$500 billion by 2030.

↔ A **BTA** is **narrower** in scope **than** a free trade agreement (**FTA**),  
 and  
 is focused on **specific goods** rather than **overall trade liberalisation**.

## What BTA could mean?

- ⇒ Trade experts said the **BTA would likely mean lower Indian tariffs on American goods**, since average US tariffs are already among the lowest in the world.
- ⇒ They said that due to **India's generally higher average tariff levels compared to competing nations** – and the fact that **India has entered into fewer FTAs than many of its competitors** – the trade margins that other countries secure in agreements are typically more favourable than those India secures.
- ⇒ A 2022 report by the Delhi Policy Group (DPG) said tariff imbalances were a key reason why ASEAN countries' exports to India were more than imports.

- Also, the think tank Global Trade Research Institute (GTRI) cautioned that the *Trump administration does not respect FTAs* – it has, for example, imposed tariffs on imports of steel and aluminium from Mexico and Canada in violation of the *United States-Mexico-Canada Agreement (USMCA)*.

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**16.02.2025**

## **Key shift in India-Afghanistan trade takeover in 2021: Exports slumps, imports surge**

**Fig, asafoetida, apple & saffron major imports**; trade gradually resuming with ‘cautious optimism’, say experts

- ▽ India’s trade equation with Afghanistan has witnessed a shift after the Taliban’s return to power in August 2021.

with **imports touching a record** \$642.29 million in 2023-24  
and  
**exports slumping to a 16-year low,**

**creating an unusual trade deficit**, reveals Ministry of Commerce data.

- ▽ This shift gains significance as New Delhi has initiated its highest-level contact yet with the Taliban regime and the latter too has expressed interest in strengthening political and economic ties with India, calling it a “*significant regional and economic power*”.
- ▽ The recent talks between India’s Foreign Secretary Vikram Misri and Taliban Foreign Minister Amir Khan Muttaqi reportedly *focused on expanding trade and leveraging Iran’s Chabahar port, which India has been developing to bypass Pakistan’s Karachi and Gwadar ports.*
- ▽ **Before this, the last time India saw a trade deficit (\$0.73 million) with Afghanistan was in 2000-01.**

▽ In 2023-24,

the top items **India imported from Afghanistan** were mainly **agricultural produce** –

figs,  
asafoetida,  
raisins,  
apples,  
garlic,  
saffron,  
fennel seeds,  
almonds,  
apricots,  
onions,  
pomegranates and  
walnuts.

- **Last year, India imported** 29,123 tonnes of **figs and almost the entire quantity came from Afghanistan.**
- Similarly, *Kabul was the biggest source of* **asafoetida, raisins** and **garlic.**

### Apple imports

- ▽ In the **last two years**, **Afghanistan** has also emerged as a **major apple supplier to India**, surpassing traditional suppliers like Italy and the US.
- In the last fiscal, it was the **third-biggest supplier of apples to India.**
  - The only two countries ahead of it were **Iran** and **Turkey.**

#### **Apple suppliers to India**

1. Iran
2. Turkey
3. Afghanistan

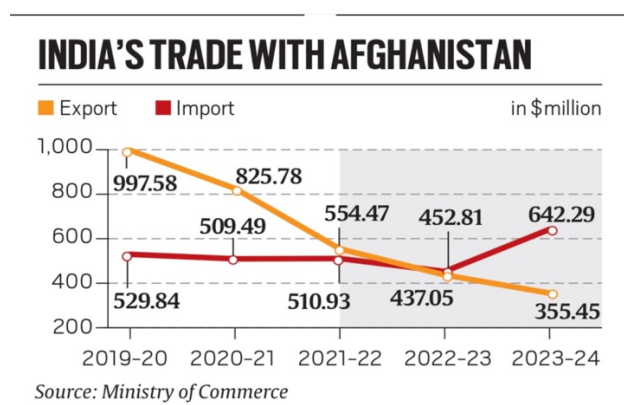
## India's Trade with Afghanistan

▽ **India's exports** of Afghanistan include mainly

medicines,  
vaccines,  
soybean meal, and  
garments.

↔ *India's bilateral trade with Afghanistan rose to its all-time high \$1.5 billion in **2019-20**, just before the Covid-19 outbreak.*

○ *In the following year, it fell.*



## Dry fruits demand

▽ Trucks loaded with Afghan dry fruits come from **Kandahar to Wagah border via Pakistan.**

▽ Traders attribute the *jump in imports* of Afghan dry fruit to *two factors* –

rising demand post-Covid

and

ease of trade after Taliban's  
takeover of Kabul.

## Saffron over poppy

→ “Now, India has **unfrozen visas for businessman from Afghanistan**; therefore, trade will increase, but it will be incremental first... Returning to the prior 2001 days will take a little time...”

→ “It is heartening to see that saffron is coming from Afghanistan. **The Afghan government had encouraged the cultivation of saffron to replace the poppy cultivation in the country.** It was started during 2008-09 and is still being continued. Their objective was to encourage saffron cultivation so that people would leave poppy cultivation.”

→ “India-Afghanistan trade reflects a **blend of economic cooperation and strategic priorities, underlining India's focus on regional stability.**

○ Despite Afghanistan's political challenges and reliance on alternative routes like the Chabahar Port in Iran, trade continues, supported by



### India's investments in projects like the Salma Dam and Afghan Parliament.

- Initiatives like the **2017 air freight corridor and duty waivers on Afghan imports** have eased trade and strengthened goodwill through humanitarian aid,”
- “The Taliban’s return to power in 2021 disrupted trade, creating security and logistical hurdles, but trade is gradually resuming with cautious optimism.
  - India plans to deepen ties by expanding Chabahar’s use, exploring new trade routes, and supporting Afghanistan’s economic recovery through development and capacity building.
  - These efforts are part of India’s broader strategy to boost regional connectivity and counter China’s influence in Central Asia.”



**Chabahar Port: Key to India's Central Asia and Europe Trade Links**



17.02.2025

## What are **India's sovereign green bonds**, and why is **demand for such bonds weak**?

- ▽ Like several emerging markets, India also turned to **sovereign green bonds to help fund its transition to a low-carbon economy**, but investor demand remains weak.
  - While **green bonds help governments raise capital for clean energy and infrastructure**, India's issues have struggled to secure a meaningful '**greenium**' – lower borrowing costs typically associated with such bonds.
- ▽ *As a result, planned allocations for key schemes, including gridscale solar, have been slashed.* With muted investor interest, India is **relying on general revenue** to bridge funding gaps.

Addressing liquidity issues  
improving reporting transparency, and  
exploring sustainability bonds

*could help boost demand and expand green finance in the country.*

### What are green bonds?

- ▽ Green bonds are **debt instruments**

issued by

governments,  
corporations, and  
multilateral banks

to raise funds for projects  
that **reduce emissions** or **enhance climate resilience**.

□ **Sovereign Green Bonds** → → only by Sovereign entity (Govt)

- ▽ Issuers typically offer **green bonds at lower yields** than conventional bonds,

assuring investors that the **proceeds will be used exclusively for green investments**.

→ The **difference in yield** –  
known as the **green premium, or greenium** –

determines the cost advantage of green bonds.

- **A higher greenium allows issuers to raise funds at lower costs,**  
making green investments more attractive.
- Investors in green bonds often seek stable, long-term returns and may also have internal or external mandates to allocate **a portion** of their funds to green financing.
- Despite their potential, green bonds constitute a small part of the debt market and overall climate financing, as governments strengthen reporting practices and introduce incentives to attract investors.

## Why green bonds?

- ▽ **Sovereign green bonds (SGrBs)** are those that are **issued by sovereign entities**, like the Government of India, which **formulated a framework** for issuing such bonds in **2022**.

- The framework defines “green projects” as those that encourage

energy efficiency in resource utilization,  
reduce carbon emissions,  
promote climate resilience, and  
improve natural ecosystems.

- ▽ Since 2022-23, India has issued SGrBs eight times and raised almost Rs 53,000 crore.
  - Each year, the government uses roughly **50 per cent of proceeds** from SGrBs **to fund production of energy efficient three-phase electric locomotives** through the Ministry of Railways.
  - For 2024-25, the revised estimates for allocations to schemes eligible under SGrBs include (allocation wise)
    - 1) Rs 12,600 crore for electric *locomotive manufacturing*,
    - 2) roughly Rs 8000 crore for *metro projects*,
    - 3) Rs 4,607 crore for *renewable energy projects*, including the National Green Hydrogen Mission, and
    - 4) Rs 124 crore for *afforestation* under the National Mission for a Green India.

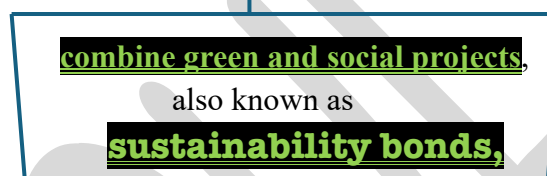
## Why investors are not excited

- ▽ India's SGrB issues have struggled to gain traction due to muted investor demand, making it difficult for the government to secure a greenium.

- Despite efforts, including easing rules for foreign investors, auctions have seen limited participation, with bonds often devolving to primary dealers.
- While globally greeniums have reached 7-8 basis points, in India it is often at just 2-3 basis points. This limits the expansion of SGrBs as a viable funding source.
- ▽ A key challenge is **liquidity**.
  - Small issue sizes and investors holding bonds until maturity have stifled secondary market trading, reducing their appeal.
- ▽ Additionally, India lacks a **strong ecosystem of social impact funds and responsible investing mandates**, which in other markets drive green bond demand.

### The way forward

- ▽ According to a recent World Bank report, emerging market sovereign issuers tend to issue more bonds that finance a combination of green and social projects compared to advanced market sovereign issuers, which overwhelmingly issue green bonds.
  - In other words, bonds for projects that



could boost investor interest and increase proceeds from issues.

#### Summary :-

- 1) EMs should with Sustainability bonds
  - 2) Advanced should with Green bonds
- ▽ The report also noted that sovereigns take considerable time to prepare the post-issuance allocation and impact report, which impacts investor interest.
  - ▽ “Most (investors) highlighted that the information provided in the allocation and impact report is used to assess the use of proceeds, screen the issuer’s bonds for inclusion in their portfolio, and use the quantitative data to further refine their internal data models and methodology,” it said.

## Launched only in 2007, green bonds have been gaining worldwide popularity

What are green bonds and what is their story?

### Where green bonds work

- Renewable energy production
- Water conservation
- Climate-resilient infrastructure
- Waste and pollution control
- Bioenergy technology development

### How green bonds work

**GREEN** bonds are used to fund environment-friendly projects at lower interest rate than regular bonds. They were introduced to encourage companies to invest more in green projects.

**May 2017:** SEBI issues guidelines on green bonds

**July:** L&T issues first SEBI-approved green bonds

**Since 2017:** After Poland, several other countries including France, Fiji, Indonesia, Ireland have issued green bonds. So far, 24 countries have done so.

**2022:** Indian government announces plans for sovereign green bond issuance worth \$2 bn

**2021**

**2021:** Annual green bond issuance by Indian companies reaches \$8 billion

**2008:** World Bank becomes the first institution to issue green bonds

**2015:** YES Bank issues India's first ever green infrastructure bonds worth \$160 mn to finance green infrastructure projects

**2008**

**2007**

**2007:** First ever Climate Awareness Bond issued by European Investment Bank worth \$807 mn

**2014**

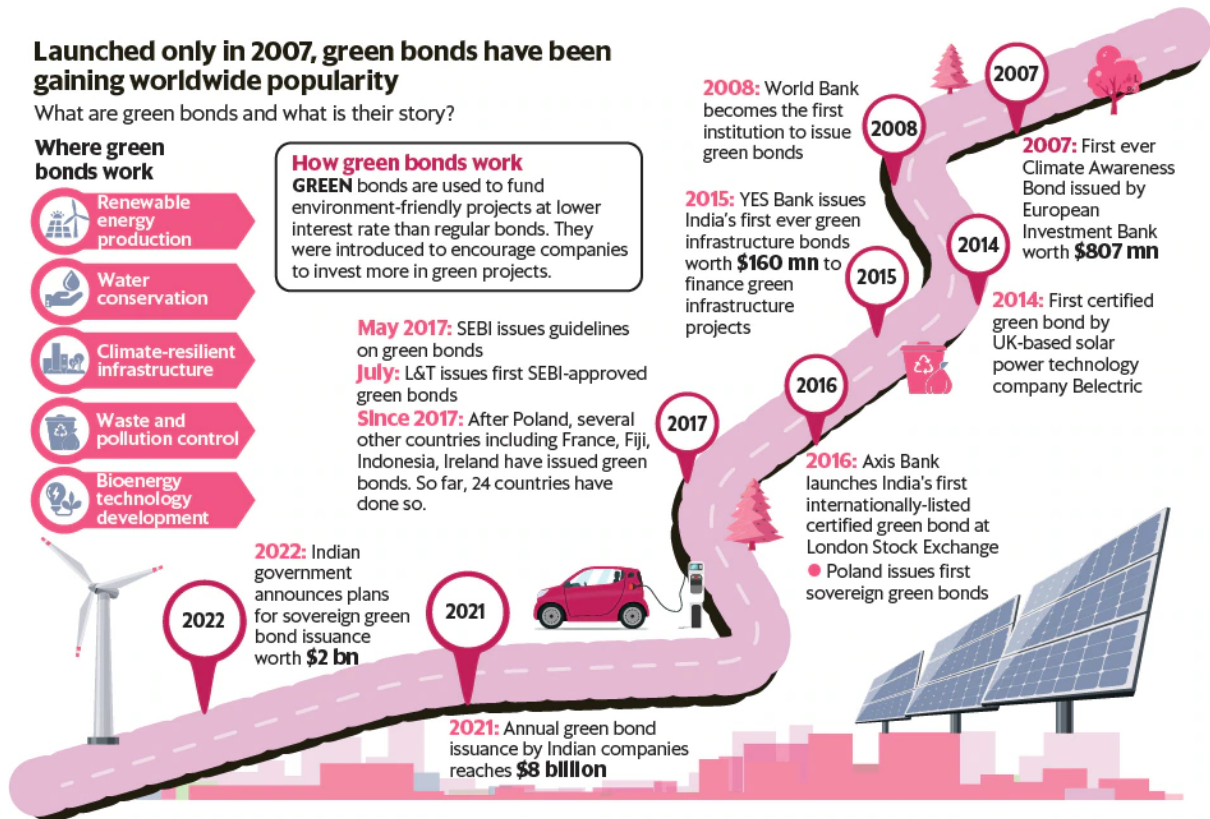
**2014:** First certified green bond by UK-based solar power technology company Belectric

**2015**

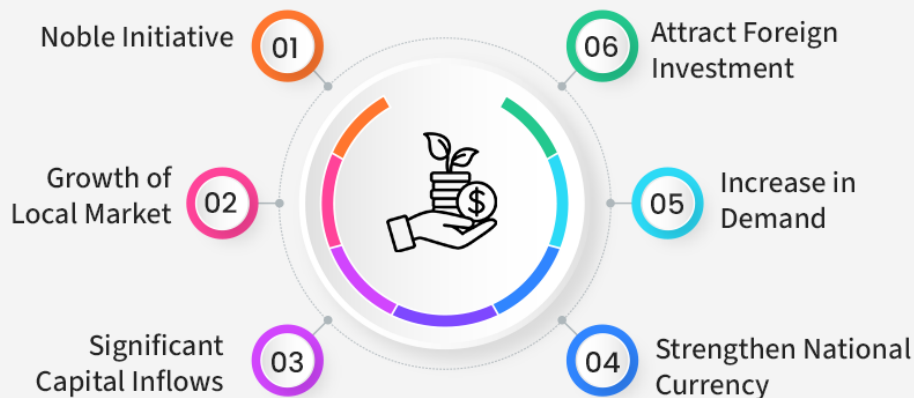
**2016**

**2016:** Axis Bank launches India's first internationally-listed certified green bond at London Stock Exchange

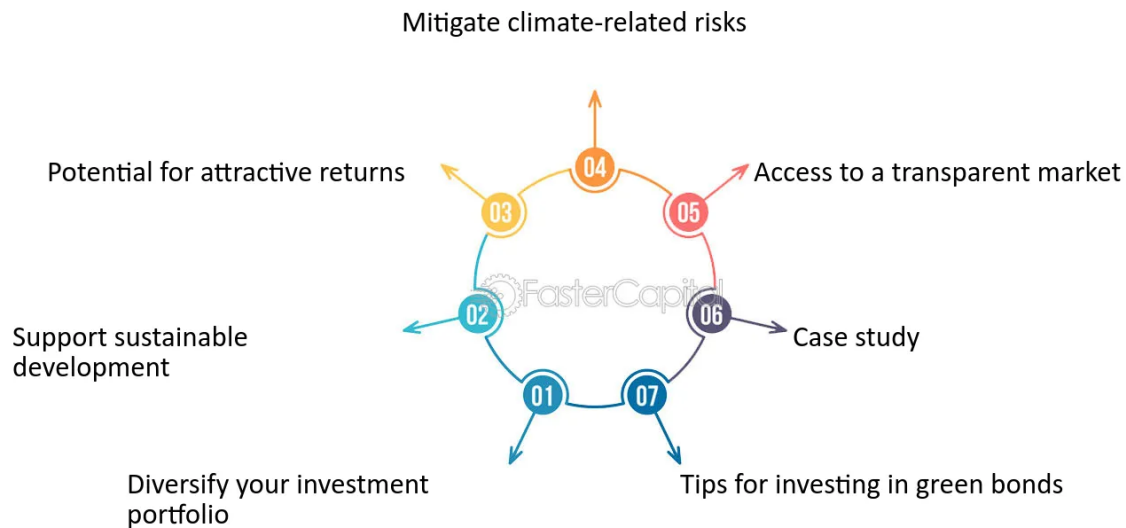
● Poland issues first sovereign green bonds



## Benefits of Sovereign Green Bonds



# Benefits of Investing in Green Bonds



## Quick Look :-

- 1) **What are green bonds issued by the RBI?**  
Green bonds issued by the RBI are debt securities used to finance environmentally sustainable projects like renewable energy and energy efficiency.
- 2) **What are the disadvantages of green bonds?**  
Disadvantages include low investor demand, limited liquidity, and minimal greenium, which reduces attractiveness for funding green projects.
- 3) **Are green bonds tax-free?**  
Green bonds are not necessarily tax-free; their tax treatment depends on the specific bond structure and jurisdiction regulations.
- 4) **What is the difference between green bonds and sovereign green bonds?**  
Green bonds fund environmental projects, while sovereign green bonds are issued by a government to finance green initiatives at the national level.
- 5) **What is the Greenium?**  
Greenium refers to the lower borrowing costs (interest rates) associated with green bonds, typically reflecting high investor demand for sustainable investments.



## **Prime Minister Dhan-Dhaanya Krishi Yojana: scheme's need, aims**

Finance Minister Nirmala Sitharaman while presenting the Union Budget on February 1 announced the launch of the Prime Minister Dhan-Dhaanya Krishi Yojana (PMDKY). (2025 Budget announcement)

### **On the lines of ADP**

- ▽ “Motivated by the success of the Aspirational Districts Programme (ADP), our government will undertake **PMDKY in partnership with states**,” Sitharaman had said while announcing the programme.
- ▽ **ADP** was **launched** by Prime Minister Narendra Modi in January **2018**.
  - The programme aimed to quickly and effectively transform 112 of the most under-developed districts across India, based on
    - 3 Cs** – **Convergence** (of central and state schemes),  
**Collaboration** (of central and state level nodal officers and District Collectors), and  
**Competition** (among districts through monthly delta ranking).
- ▽ The **ranking** is based on the incremental progress made across 49 Key Performance Indicators under five broad socio-economic themes:
  - Health & Nutrition,
  - Education,
  - Agriculture & Water Resources,
  - Financial Inclusion & Skill Development and
  - Infrastructure.

### **Districts to be covered**

- ▽ PMDKY will cover **100 districts** based on **three broad parameters**:
  - low productivity,  
moderate crop intensity, and  
below-average credit parameters
- According to sources, the **Ministry of Agriculture and Farmers' Welfare** has been collecting data on these parameters, based on which the **districts will be identified**.

▽ **Cropping intensity** is a measure of how efficiently land is used, and it is defined as the percentage of the gross cropped area to the net area sown.

- In simple words, the cropping intensity indicates the number of crops grown on a piece of land in an agricultural year (July-June).

- ▽ *At the all-India level, the cropping intensity was recorded at 155% in 2021-22, although the figure greatly varied from state to state..... cropping intensity was only 111% in 1950-51.*
- ▽ Sources also said that the ministry has requested the Department of Financial Services and NABARD to share the data on district-wise farm credit.

## **Objective of scheme, allocation made**

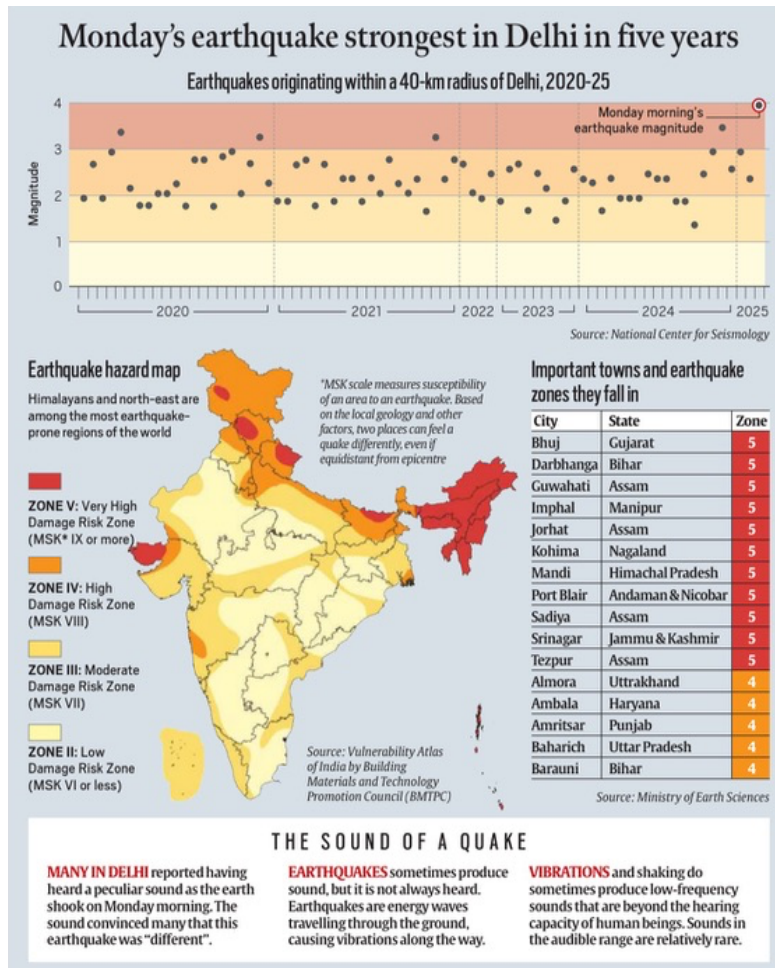
- ▽ According to the Finance Minister, the programme has the following **five objectives**:
  - Enhancing agricultural productivity;
  - Adopting crop diversification and sustainable agriculture practices;
  - Augmenting post-harvest storage at the panchayat and block level;
  - Improving irrigation facilities; and
  - Facilitating availability of long-term and short-term credit.
- “This programme is likely to help 1.7crore farmers,”
- ▽ Although Budget documents *do not provide a separate allocation for the scheme*,
  - > officials said that **funds will be drawn from** various schemes implemented by the Ministry of Agriculture and Farmers' Welfare, and the Ministry of Fisheries, Animal Husbandry and Dairying.
  - > According to the officials, the government can make an allocation for the scheme after it is formally approved by the Union Cabinet, and before its roll-out on the ground.



**18.02.2025**

# The dawn quake in Delhi

The capital lies in the Aravalli-Delhi Fold Belt, where deformed layers of rock sometimes release stress in the form of earthquakes. This mechanism is different from the one that triggers quakes in the Himalayan region



- Recently, a **magnitude 4** earthquake struck near Dhaula Kuan, **Delhi (Zone 4)**, marking the strongest locally generated quake in at least five years.
  - **About Aravalli-Delhi Fold Belt:** Extends from southern and eastern Rajasthan to Haryana and Delhi.
  - **Formation:** Consists of deformed rock layers that were folded due to geological stress hundreds of millions of years ago.
  - **Seismic Activity:** Historically, the region was more active, but tectonic activity has slowed, making it **relatively stable.**
- Residual geological faults still trigger occasional mild earthquakes.

- Unlike the **Himalayan region**, where earthquakes occur due to subduction of the Indian plate under the Eurasian plate,

**Delhi's** quakes arise from localized stress release within ancient rock formations.

### Sound During the Earthquake

- Many Delhi residents reported hearing a peculiar sound during the earthquake.
- While earthquakes do produce sound, it is often at frequencies beyond human hearing.
- However, in some cases, large earthquakes can create audible sounds due to vibrations.
- These sounds are often mistaken for the earthquake itself but are usually caused by the shaking of buildings, objects, or underground structures.

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◆ About Earthquakes: It is the sudden shaking of the Earth's surface caused by the release of energy from the Earth's crust due to stress accumulation.

◆ Types of Earthquakes:

- Tectonic Earthquakes - Caused by movement of tectonic plates, the most common type (e.g., Himalayan earthquakes).
- Volcanic Earthquakes - Associated with volcanic activity due to magma movement (e.g., Mount St. Helens eruption).
- Collapse Earthquakes - Result from cave or mine collapses, generally of low magnitude.
- Induced Earthquakes - Triggered by human activities like reservoir-induced seismicity, mining, and geothermal energy extraction.

## **Understanding MSK Intensity Scale**

- The MSK (Medvedev-Sponheuer-Karnik) scale **measures earthquake intensity, not magnitude.**
- It assesses how an earthquake affects buildings and infrastructure.
- Delhi's classification under MSK-8 means it is prone to major structural damage.
- The most earthquake-prone areas in India fall under Zone 5, which corresponds to MSK-9 or higher intensity.

### **Quick Look :-**

- 1) **Why did the recent Delhi earthquake gain attention?**  
It was the strongest earthquake in Delhi in five years, with its epicenter near Dhaula Kuan.
  - 2) **What is Delhi's earthquake risk level?**  
Delhi falls in Zone 4, meaning it has a high seismic risk with the potential for significant damage.
  - 3) **Why do earthquakes occur in Delhi?**  
Delhi lies in the Aravalli-Delhi Fold Belt, which has pre-existing faults that occasionally release stress as earthquakes.
  - 4) **Can Delhi experience a major earthquake?**  
While strong earthquakes in Delhi are rare, earthquakes from the Himalayan region can impact the city.
  - 5) **Why did people hear a sound during the earthquake?**  
Earthquake vibrations can create low-frequency sounds, which in rare cases, can be audible to humans.
-

**19.02.2025**

## **India and Qatar**

EXPLAINED

### **Why Qatar matters**

QATAR IS a key player and mediator in the on-going conflict between Israel and Hamas. Delhi buys a massive amount of natural gas from Qatar and has a large Indian community there. It also wants Doha to invest in India's infrastructure.

### **THE OUTCOMES**

- Expedite negotiations on the India-Qatar Bilateral Investment Treaty.
- Explore a bilateral Comprehensive Economic Partnership Agreement.
- Qatar's commitment to invest USD 10 billion.
- Qatar Investment

Authority (QIA) to open an office.

- Nationwide rollout of UPI acceptance in Qatar.
- Celebrate India-Qatar Year of Culture, Friendship and Sports in the near future.
- Extension of e-visa facility to Qatari nationals.

- India **imported Natural gas, liquefied (LNG)** from
    - 1) Qatar
    - 2) United States
    - 3) United Arab Emirates
    - 4) Angola
    - 5) Oman
  - **Assam** is the largest producer of natural gas in India.
  - **Top producers of Natural Gas :-**
    - 1) USA
    - 2) Russia
    - 3) Iran
    - 4) China
    - 5) Canada
    - 6) Qatar
  - **ONGC** contributes to around 70% of India's crude oil and around 84% of its natural gas production.
-



## Unemployment rate drops marginally to 6.4% in Dec qtr

New Delhi: The rate of unemployment among people aged 15 years and above in urban areas dropped marginally to 6.4 per cent in the October-December quarter of the current fiscal, according to the National Sample Survey Survey (NSSO).

Joblessness, or unemployment rate, is defined as the percentage of unemployed people in the labour force.

The unemployment rate in the December quarter of FY24 was 6.5 per cent. However, the rate stayed flat when compared sequentially.

In the preceding July-September quarter of FY25, the rate of unemployment for people aged 15 years and above in urban areas was at the same level of 6.4 per cent, the 25th Periodic Labour Force Survey (PLFS) showed. **PTI**

### Always remember :-

- India's benchmark is **15 years and above** to determine the criteria of unemployment
- **Data published by National Sample Survey Office (NSSO), MOS&PI.**
- National Sample Survey Office (NSSO) has been conducting the Periodic Labour Force Survey (PLFS) since 2017.

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**21.02.2025**

### Article 101(4)

#### In News :-

Amritpal Singh, incarcerated under the National Security Act, has moved the Punjab and Haryana High Court to attend the ongoing Parliament session. He seeks to avoid disqualification under Article 101(4) due to prolonged absence from the Lok Sabha.

#### Constitutional excerpt:-

If for a **period of sixty days** a member of either House of Parliament is without permission of the House absent from all meetings thereof, the House may declare his seat vacant: Provided that in computing the said period of sixty days no account shall be taken of any period during which the **House is prorogued or is adjourned for more than four consecutive days.**

#### Who does take decision in this context regarding disqualification?

Speaker (Lok Sabha) or Chairman (Rajya Sabha).

### **Exceptions & Considerations**

- MPs can apply for leave of absence due to valid reasons such as illness, detention, or unavoidable circumstances.
- If the House grants permission, the MP does not lose their seat.
- In case of legal detention, courts may intervene to allow attendance if required.

### **MPs can seek leave**

The operative term in Art 101(4) is “without permission of the House”.

- > For long absences, MPs write to the ‘**Committee on Absence of Members from the Sittings of the House**’, *the parliamentary panel that deals with the issue.*
- > *The committee makes recommendations on each leave application, which are then ratified by the House concerned.*
- > In practice, however, applications are seldom rejected.
- > Past leave applications reports list illness – their own **or some relative’s** – as the most common reason for MPs being granted leave.
- > Even if an MP is absent for more than 60 days, the House to “declare” the seat vacant, meaning the matter has to be **put to vote.**

### **Anti - Defection Law [Tenth Schedule -- Art 102(2) and 191(2)]**

- ▽ The Constitution (**Fifty-Second Amendment) Act, 1985**), introduced as an anti-defection bill in the parliament to prohibit its members from hopping between different political parties and inserted a new Schedule in the constitution i.e. **the 10th schedule. (comprising of 8 paragraphs)**
- ▽ It **altered the provisions of Articles 101**, where it laid down the grounds of defection for members of either house of Parliament or state assemblies or councils.
- ▽ It **aims to** prevent political defections for reasons of office and other considerations from causing harm to democracy.
- ▽ Its **proposed solution** is to bar Members of Parliament and State Legislatures who deviate from party politics from continuing to hold their political office.
- ▽ This was not passed without a major change in the country’s political landscape. Nevertheless, it is the highest-level document drafted by our democracy and has the potential to make Indian politics more transparent.
- ▽ Aside from enhancing political freedoms, this amendment also contains provisions **to curb corruption.**
- ▽ The constitution’s anti-defection provisions were a result of a series of debates over the issue.

#### **Paragraph-5: Exemption.**

This paragraph provides exemptions to the

**Speaker, Chairman and Deputy-Chairman of various legislative Houses.**

**22.02.2025**

**What is the difference between an ex-gratia payment and compensation?**

- Ex gratia is Latin for “*by favour*”.
  - Such payments are made out of a **moral – not legal - obligation**.
  - They are gestures of **goodwill**, but ones that do not involve admitting any liability or wrongdoing.
- Compensations, on the other hand, are made out of a **legal obligation**.
  - They are reparatory payments that are meant to reimburse or make amends for the loss of life, property, livelihood, etc.

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**RBI to conduct forex swap worth record \$10 billion to inject liquidity**

*Mumbai:* The Reserve Bank on Friday announced a huge \$10 billion dollar-rupee swap auction programme to inject durable liquidity in the banking system.

The USD/INR Buy/Sell swap auction of \$10 billion for a tenor of 3 years will be conducted on February 28, the Reserve Bank said in a statement. The swap is in the nature of a simple buy/sell foreign exchange swap

from the central bank's side. A bank shall sell US dollars to RBI and simultaneously agree to buy the same amount of US dollars at the end of the swap period.

“In order to meet the durable liquidity needs of the system, the Reserve Bank has decided to inject Rupee liquidity for longer duration through long-term USD/INR Buy/Sell swap,” RBI said. **PTI**

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**23.02.2025**

**How RBI's \$10-bn swap can boost liquidity**

- After conducting a dollar-rupee buy-sell swap of \$5 billion less than a month ago,

↓  
the Reserve Bank of India (RBI) on Friday  
**decided to inject rupee liquidity**  
for longer duration through another \$10-billion swap arrangement.

- The central bank's initiative is designed to provide a durable solution to the system's liquidity requirements, *while also stabilising the value of the rupee*  
and  
*bolstering the nation's foreign exchange kitty.*

## How serious is the liquidity problem?

➤ The **Indian banking system encountered its worst liquidity crunch in more than a decade in January 2025.**

- > The liquidity deficit peaked at Rs 3.15-lakh crore on January 23, its lowest level in nearly 15 years.
- As was the case in the preceding month,

tax outflows,  
GST payments, and  
the RBI's forex interventions

to stabilise the rupee and currency in circulation (CIC) outflows significantly impacted cash flows in the banking system.

- > The deficit led to increased dependence by banks on market borrowing, thereby keeping interbank **call money rates** – rate at which banks lend to each other – consistently above the policy repo rate of 6.50 percent, according to Crisil.
- The RBI has been selling dollars to stabilise the rupee, thereby removing an equivalent amount in rupee from the system.

## How does swap work?

- The swap is in the nature of a simple buy-sell foreign exchange swap from the Reserve Bank of India's side.
  - > **A bank will sell US dollars to the RBI and simultaneously agrees to buy the same amount of US dollars at the end of the swap period.**
- In the first leg of the transaction, the bank will sell dollars to the RBI at FBIL Reference Rate of the auction date.
  - > The settlement of the first leg of the swap will take place on spot basis from the date of transaction and the RBI will credit the rupee funds to the current account of the successful bidder and the bidder needs to deliver dollars into the RBI's nostro account.
  - > In the reverse leg of the swap transaction, rupee funds will have to be returned to the RBI along with the swap premium to get the dollars back.

## **FBIL Reference Rate**

### ➤ What is the FBIL rate?

FBIL Reference rate means the rates of currency pairs computed and published on a daily basis, on all Mumbai business days, by Financial Benchmarks India Private Limited.

### ➤ Is FBIL regulated by RBI?

Yes, FBIL is authorised by Reserve Bank of India (RBI) to operate as a Benchmark Administrator in India. It has been granted authorisation to continue administering 'Significant Benchmarks' for financial instruments.

### ➤ Who owns FBIL?

The FBIL, jointly owned by FIMMDA, FEDAI, and IBA, was formed in December 2014 as a **private limited company under the Companies Act 2013**.

**Gaining Currency**

- **FBIL** is independent benchmark administrator for interest & forex rates
- **Currently**, it announces the rate with a day's lag
- **This allows** only registered users to access info on same day
- **Earlier**, the reference rate was announced by RBI
- **Job was** handed over to FBIL after RBI decided to intervene in exchange-traded currency futures market

## **LIBOR (London Interbank Offered Rate)**

- > LIBOR was the benchmark interest rate at which major global banks lend to one another.
- > LIBOR was administered by the Intercontinental Exchange, which asks major global banks how much they would charge other banks for short-term loans.
- > The rate was calculated using the Waterfall Methodology, a standardized, transaction-based, data-driven, layered method.

- > LIBOR has been subject to manipulation, scandal, and methodological critique, making it less credible today as a benchmark rate.
- > LIBOR was replaced by the Secured Overnight Financing Rate (SOFR) on June 30, 2023.



**25.02.2025**

## **Strategy on fertilisers**

- ⇒ **How can India cut Urea, DAP, MOP consumption?**
- ⇒ **The shortage of DAP has given a boost to the sales of APS,**  
**a complex fertiliser that has become India's third largest-**  
**selling plant nutrient product after Urea and DAP**

- Capping or reducing the consumption of **urea**, di-ammonium phosphate (**DAP**) and muriate of potash (**MOP**) has become a strategic imperative of sorts for India.
- The reason:

**all these fertilisers are imported,**  
**whether directly or as inputs for domestic manufacturing.**

- **MOP** is wholly *imported from* countries such as

- Canada,
- Russia,
- Jordan,
- Israel,
- Turkmenistan
- Belarus,

**as India has no mineable potash reserves.**



- In urea, *India's production meets over 85% of its consumption demand*,

but

the plants mostly run on **liquefied natural gas (LNG)** imported from

Qatar,  
the US,  
UAE, or  
Angola.

- DAP is *imported*

- ▽ *in the form of finished fertiliser*

(mainly from **Saudi Arabia, China, Morocco, Russia and Jordan**)

- ▽ *as well as raw material*

(rock phosphate from **Jordan, Morocco, Togo, Egypt and Algeria**;

sulphur from **UAE, Qatar and Oman**) and

- ▽ *intermediate chemicals*

(phosphoric acid from **Jordan, Morocco, Senegal and Tunisia**;

ammonia from **Saudi, Qatar, Oman, and Indonesia**).

- ◆ *Besides import dependence – made worse by the depreciation of the rupee – a second reason for limiting urea, DAP and MOP usage is that they are*

*“high-analysis” fertilisers:*

Urea contains **46% nitrogen (N)**

MOP contain **60% potash (P)**

DAP has **46% phosphorus (P) + 18% nitrogen (N).**

## DIAMMONIUM PHOSPHATE

(DAP) 18-46-0

**BENEFITS OF MOSAIC DAP:**

- Enhances Root Growth
- Improves Crop Quality

---

- Granular
- Consistent
- Genuine



~ Available in 50 kg Bag ~

♦ **Most crops don't require fertilisers with such a high percentage of individual nutrients.**

- They need **balanced fertilisation** – products with nutrients in the right quantities and ratios for effective absorption through the plant roots and leaves.
- These include not only N, P and K, but also secondary nutrients (sulphur, calcium and magnesium) and micronutrients (zinc, iron, copper, boron, manganese and molybdenum).
- Weaning away farmers from high-analysis fertilisers also translates into more efficient use of imported material and scarce foreign exchange.

### Effective DAP replacement

↔ A good example is **20:20:0:13 or ammonium phosphate sulphate (APS).**

- A complex fertiliser with

**20% N,**  
**20% P,**  
**0% K and**  
**13% sulphur (S),**

it has emerged as an effective substitute for DAP, despite having less than half of the latter's P content.

↔ **APS has become India's third largest-consumed fertiliser after urea and DAP.**

- It has overtaken **single super phosphate (SSP)**, previously the most popular alternative to DAP.
- **SSP, which contains 16% P and 11% S,**

is manufactured by  
**reacting rock phosphate directly with sulphuric acid.**

### ALL-INDIA USE OF FERTILISER PRODUCTS

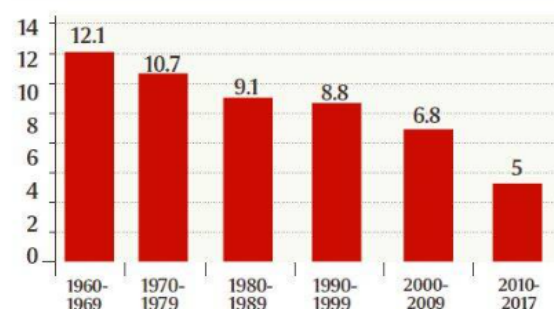
|         | UREA   | DAP    | MOP*  | NPKS   | SSP   |
|---------|--------|--------|-------|--------|-------|
| 2009-10 | 266.73 | 104.92 | 46.34 | 80.25  | 26.51 |
| 2010-11 | 281.13 | 108.7  | 39.32 | 97.64  | 38.25 |
| 2011-12 | 295.65 | 101.91 | 30.29 | 103.95 | 47.46 |
| 2012-13 | 300.02 | 91.54  | 22.11 | 75.27  | 40.3  |
| 2013-14 | 306    | 73.57  | 22.8  | 72.64  | 38.79 |
| 2014-15 | 306.1  | 76.26  | 28.53 | 82.78  | 39.89 |
| 2015-16 | 306.35 | 91.07  | 24.67 | 88.21  | 42.53 |
| 2016-17 | 296.14 | 89.64  | 28.63 | 84.14  | 37.57 |
| 2017-18 | 298.94 | 92.94  | 31.58 | 85.96  | 34.39 |
| 2018-19 | 314.18 | 92.11  | 29.57 | 90.28  | 35.79 |
| 2019-20 | 336.95 | 101    | 27.87 | 98.57  | 44.03 |
| 2020-21 | 350.43 | 119.11 | 34.25 | 118.11 | 44.89 |
| 2021-22 | 341.8  | 92.72  | 24.57 | 114.79 | 56.81 |
| 2022-23 | 357.25 | 105.31 | 16.32 | 100.73 | 50.18 |

\*For direct application, excluding supply to complex fertiliser units.



Gettyimages

### CROP YIELD RESPONSE TO FERTILISERS



- 1) Urea
- 2) DAP
- 3) NPKS
- 4) SSP
- 5) MOP

- ♦ See, regarding the use, UPSC will ask the question on steady increase or decline by framing a span of years (e.g. last 5 years)
  - The answer on the question of “STEADY” would be “NO”

## The New Right

**‘Liberal values’ of ‘the West’ are being challenged at source. A response can only come from understanding, not denigration**

The institutions and values firmed up in Europe and the US – the West – in the last decade of the 20<sup>th</sup> century are facing a crucial moment of reckoning. Western liberalism and the much-touched “rules-based order” championed by Washington and Brussels arguably reached their pinnacle after the G7 was expanded to include Russia in 1998. The “end of history” moment, though, now seems a thing of the past. The economic vision articulated as the “Washington Consensus” – with a focus on free markets, trade liberalisation, fiscal discipline – began eroding with the 2008 financial crisis and the rise of China. It is now being challenged by Donald Trump in the very place of its origin. It can be said to be framed by recent political events – the election results in Germany, and the speeches by Italian Prime Minister Giorgia Meloni at the Conservative Political Action Conference in the US and by US V-P J D Vance at the Munich Security Conference. Rather than ignore – or denigrate – the political-ideological frameworks that are being writ large on the global landscape, liberal politics needs to understand and engage with them.

Even as he “bore full responsibility” for the poor showing of the Social Democratic Party (SDP), German Chancellor Olaf Scholz rejected the possibility of even speaking to the AfD:

Germany's far-right outfit – riding on an anti-immigrant campaign – is now the second-largest party in the legislature. The upward climb of the AfD is of a piece with the rise and rise of many other parties once thought to be on the fringe. The question, though, is why. Conservative leaders like Meloni have an explanation – it would not do merely to dismiss it as self-serving. While liberal leaders like Bill Clinton and Tony Blair were hailed as statesmen when they work together, she says, “when Trump, Meloni, ... Modi talk, they are called a threat to democracy. This is the Left's double standard... but we are used to it, and the good news is people no longer believe in their lies, despite all the mud they throw at us. Citizens keep voting for us”. Vance, for his part, has pointed to issues that have defined the culture wars in the US – free speech vs hate speech, abortion, prayer in public spaces – and urged Europe to look at the hypocrisies and inconsistencies within.

There are now ascendant political parties across Europe and beyond that will echo Meloni and Vance. The despondency shown by Scholz, and the “basket of deplorable” view of those who voted for the right, however, is myopic and self-defeating. It is important to acknowledge that a once-formidable consensus is under siege and that there are several complications in its apparent breakdown. It is vital to recognise that the challenger also contains multitudes, there is no singular right-wing. Abortion and gun control might be divisive issues in the US, for instance, but they are not a major feature of the political conversation on the right in India. The crisis for liberal politics is also born of its own lack of agility and imagination. Any way out of it must begin with fresh ideas, a much-needed rethink.

(This article is important for Mains not Prelim @ Decline of “Western liberalism” with the reemergence of Right groups' governance)

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**27.02.2025**

### **Why Gharials are endangered, how MP has led conservation efforts**

- ▽ A critically endangered species, MP had led a decade-long effort for the crocodilian's conservation. Today, more than 80% of India's gharial population lives in the state.
- ▽ *Gavialis gangeticus* is a long-snouted, fish-eating crocodilian.
  - Males grow from three to six metres, and (male @ Longer)
  - females 2.6 to 4.5 metres.
  - Gharials mate in the winter (November to January).
- ▽ *Sandbanks and islands* are critical to their ecology, serving as preferred sites for basking and nesting.
  - Between March to May, as river levels recede, female gharials climb onto exposed sandbanks and islands to *nest communally*.
  - Many lay their eggs in the same area.
  - *Females provide parental care* for the first few days after hatching.
- ▽ Gharials play an important role in a river's ecosystem by **cleaning up carrion – the decaying flesh of dead animals.**

- ▽ Wildlife researchers have said the species is
- ~ likely **extinct** in **Myanmar and Bhutan**,
  - ~ with **only small, uncertain populations** remaining in
    - **Pakistan,**
    - **Nepal, and**
    - **Bangladesh's upper Brahmaputra.**

### What threats do gharials face?

- Historically, the gharial population has declined due to **overhunting**.
  - They are prized for their skin, eggs, and as trophies.
- Today, dam construction, irrigation canals, siltation, river course changes, embankments, sand mining, pollution, and fishing are some of the threats that gharials face.
  - **Gill nets**, in particular, kill gharials of all sizes, even in protected areas.  
(Gill nets are vertical walls of netting that catch fish by entangling them. They are a passive fishing method that can be set in the water to catch fish as they swim by.)





| Species     | Mugger Crocodile                                              | Estuarine or Saltwater Crocodile                                                        | Gharial                                          |
|-------------|---------------------------------------------------------------|-----------------------------------------------------------------------------------------|--------------------------------------------------|
| Description | Egg laying, hole nesting, dangerous                           | Largest living crocodile, man eater                                                     | Long, thin snout, harmless, fish eating          |
| Habitat     | Indian subcontinent (rivers, lakes, marshes, coastal lagoons) | Bhitarkanika, Sundarbans, Andamans, Nicobar Islands, Southeast Asia, Northern Australia | Himalayan rivers (Chambal, Ghagra, Gandak, etc.) |
| Threats     | Habitat destruction, fishing, medicinal use of parts          | Illegal hunting, habitat loss, man eater perception                                     | Sand mining, river pollution, fishing, floods    |



|                          |                                                                                |                                                                                                                                   |                                                                                           |
|--------------------------|--------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------|
| <b>Protection Status</b> | IUCN: Vulnerable, CITES: Appendix I, Wildlife Protection Act, 1972: Schedule I | IUCN: Least Concern, CITES: Appendix I (except Australia, Indonesia, Papua New Guinea), Wildlife Protection Act, 1972: Schedule I | IUCN: Critically Endangered, CITES: Appendix I, Wildlife Protection Act, 1972: Schedule I |
|--------------------------|--------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------|

### **Indian Crocodile Conservation Project**

| Program                        | Start Year | Species Covered                      | Impact                                                                              |
|--------------------------------|------------|--------------------------------------|-------------------------------------------------------------------------------------|
| Crocodile Conservation Project | 1975       | Gharial, Saltwater Crocodile, Mugger | Saltwater crocodile population increased from 96 in 1976 to 1,640 in 2012 in India. |

# CROCODILES OF INDIA

WILDLIFE SOS



## GHARIALS

*Gavialis gangeticus*

Male gharials are easily distinguished due to the presence of a bulb on their snouts, like earthenware pots called gharas. They are used to vocalise and blow bubbles to attract females.

**Habitat:** They are found in clear freshwater river systems, congregating at river bends.

**Threats:** Illegal poaching, egg collection, fishing nets, sand mining, prey base depletion, and habitat loss and degradation.



## MUGGER CROCODILE

*Crocodylus palustris*

Also called marsh crocodile, Mugger Crocodiles are one of the most adaptable crocodilian species in India. With the broadest snout of all, they are keystone species of their habitat.

**Habitat:** They are found in freshwater habitats including rivers, lakes, marshes, and estuarine.

**Threats:** Illegal poaching, egg collection, fishing nets, and habitat loss and degradation.

## SALTWATER CROCODILE

*Crocodylus porosus*

The Earth's largest living reptile, saltwater crocodiles have the greatest bite pressure of any animal. Males are much larger than females, weighing even upto 1,000 kilograms!

**Habitat:** They inhabit coastal brackish mangrove swamps and river deltas.

**Threats:** Illegal hunting and habitat loss and degradation.



## IUCN STATUS



## GLOBAL POPULATION

of mature individuals

|                      |                                                                                                                                                                                                                                                             |           |
|----------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------|
| Gharials             |                                                                                                                                                                          | 650       |
| Mugger Crocodiles    |                                                                                       | 5700-8700 |
| Saltwater Crocodiles |    | 500,000   |

**28.02.2025**

**CITES 'UNACCEPTABLE LEVELS' OF FENTANYL SMUGGLING INTO U.S.**

# Trump says tariffs on Mexico, Canada from Tuesday, slaps additional 10% on China

EXPLAINED

## **E** NAFTA could be jeopardised

DONALD TRUMP'S threats against the two key trading partners have caused widespread alarm, as the North American economy is closely knit due to the NAFTA (North American Free Trade Agreement). Mexico and Canada have previously vowed to counter US tariffs with retaliatory measures. The two, along with China are the US's top 3 trade partners, together accounting for over 40% of imports into the US.



## **NAFTA**

- ♦ The North American Free Trade Agreement (NAFTA) was implemented in 1994 to encourage trade among the U.S., Mexico, and Canada.
- ♦ NAFTA reduced or eliminated tariffs on imports and exports among the three participating countries, creating a huge free-trade zone.
- ♦ Two side agreements to NAFTA aimed to establish high common standards in workplace safety, labor rights, and environmental protection, to prevent businesses from relocating to other countries to exploit lower wages or looser regulations.
- ♦ It was later replaced by the United States-Mexico-Canada Agreement (USMCA), which was signed on Nov. 30, 2018, and went into full force on July 1, 2020.
- ♦ NAFTA was a controversial agreement, harming the U.S. economy in some measures and improving it in others.

**SOUTH KOREA'S FERTILITY RATE HAS BEEN THE LOWEST IN THE DEVELOPED WORLD IN RECENT YEARS**

## Number of births in South Korea rebounded in 2024, for first time in nearly a decade

- South Korea's statistics agency said Wednesday that 2,38,300 babies were born last year, an increase of 8,300 from a year earlier.
  - > It said the **country's fertility rate** – the average number of babies born to each woman in their reproductive years – **was 0.75 in 2024, up from 0.72 in 2023.**
- It's the *first time that the yearly number of births has increased since 2015.*
- The low fertility rate is considerable as a major potential threat to South Korea's economy, Asia's fourth largest, as it will cause labour shortages and greater welfare spending.
- They cite expensive housing, low levels of social mobility, the huge cost of raising and educating children and a culture that requires women to handle far more of childcare.

**04.03.2025**

## **Sangam Pollution**

▽ **BOD** (**Biochemical Oxygen Demand**) → → **is a measure of the amount of oxygen**

required by microorganisms

to break down organic matter

in water

over a fixed period,

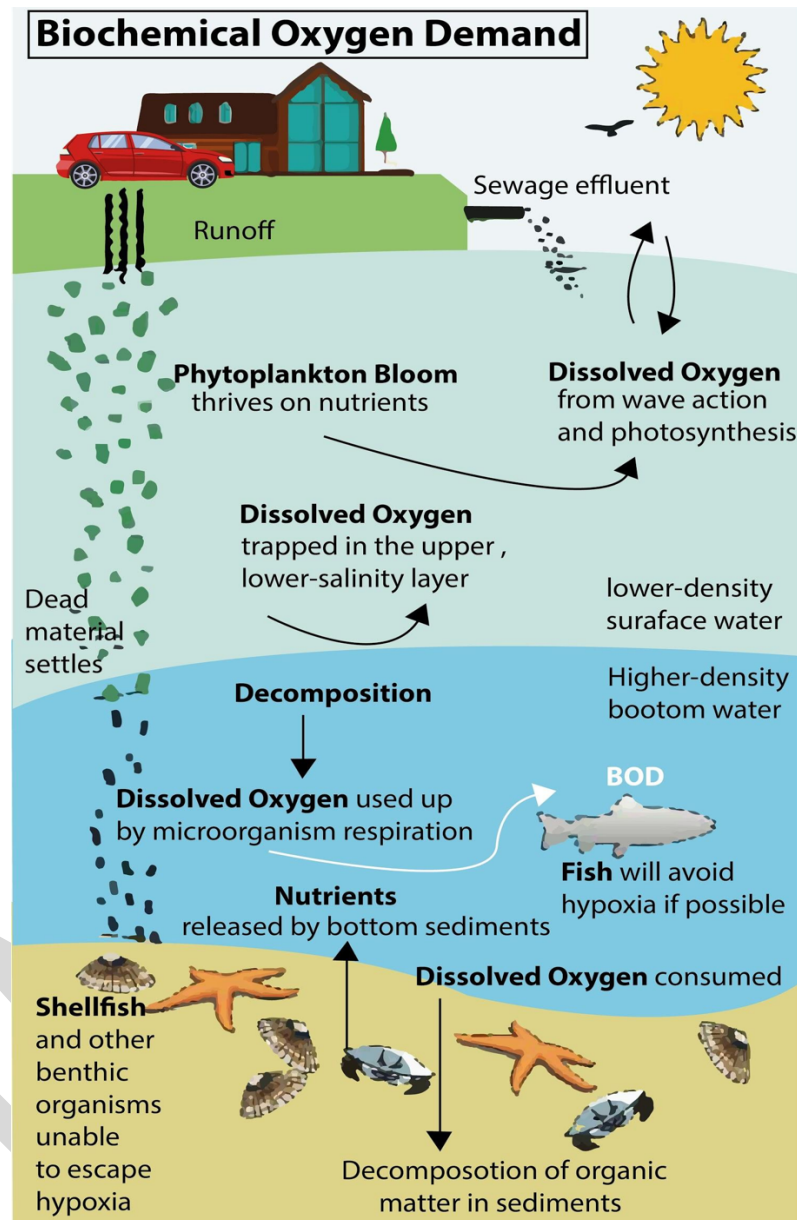
usually 5 days, at 20° C.

→ **High BOD means higher organic pollution in a river.**

→ This **leads to oxygen depletion** *resulting in suffocation of fish or other aquatic organisms.*

→ The **CPCB limit for BOD** in instances of "organised bathing outdoors" is **3 mg per litre or less**, which means the **water is considered safe.**

- ▽ The measure of fecal coliform was up to 100 while the permissible limit is 25,000.



## After successful **private landing** on Moon, more missions to follow

- ▽ An American private space company called Firefly Aerospace successfully landed its spacecraft on the Moon on Sunday, the first of several arrivals that the lunar surface is expecting the year.



- ▽ Firefly's Blue mission is the **second time** that a private space company has landed on the Moon, after

**Intuitive Machines' Odysseus spacecraft achieved this feat last year.**

- ▽ **NASA** is currently facilitating a host of private missions to the Moon, as it tries to build a larger ecosystem of space transportation companies in anticipation of more frequent travels to the celestial body in the coming years.

## **AIIMS new Milk Bank**

- ▽ **Payodhi**, the milk bank at AIIMS that was inaugurated in February,

relies on donor mothers like Jyoti for

the **pre-term babies** –  
those **born before 32 weeks or weighing less than 1.5kg** –

under its care.

→ Set up as part of the Health Ministry's guidelines to open more lactation management centres, the facility at **AIIMS is the second breast milk bank in a public hospital in Delhi** and one of only 90 such centres across the country.

The **first human milk bank in India** was established in 1989 at the **Lokmanya Tilak Municipal General Hospital (Sion Hospital)** in **Mumbai**

- ▽ Milk banks can play a **key role in reducing neonatal deaths** – in India, an estimated 5.8lakh **newborns die within 28 days of birth**.

→ **Early initiation of breast milk – within an hour of birth – can cut down such deaths by nearly 22 per cent.**

- ▽ “There is evidence to show that donor breast milk **can reduce the risk of sepsis (severe blood infection)** by 19 per cent as compared to formula.



→ It has also been shown to reduce the risk of necrotising enterocolitis – a severe infection with a mortality rate of 40% - by 79 per cent,”

▽ Breast milk can also lower the risk of retinopathy – the biggest cause of blindness in pre-mature infants – and reduce feeding intolerance, thus resulting in shorter NICU stays for infants.

▽ At the AIIMS milk bank, mothers can express and store their milk, either for their babies or for donation.

→ The milk that is donated is pasteurised and given to sick babies who, for varying reasons, may not have access to their mothers’ breast milk.

▽ The milk bank is a *three-room setup with*

freezers to store the milk,  
a machine to disinfect the bottles, and  
another to pasteurise the milk.

▽ Donating milk benefits the mother as well, “If the mother doesn’t keep expressing frequently, her milk production might be suppressed.”

### WHO IS A PRETERM BABY?

Any baby born alive **before 37 weeks** of pregnancy is a preterm baby

### HOW MANY SUCH BABIES ARE BORN EVERY YEAR?

Globally, an estimated **15 million** babies

### AND HOW MANY OF THEM DIE DUE TO PRETERM COMPLICATIONS?

**Almost 1 million** die each year. It's the leading cause of death among children under

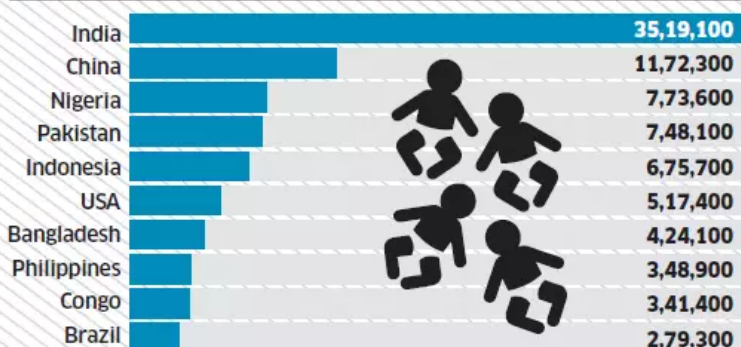
**5 years of age.**

Many survivors face a lifetime of disability, including learning disabilities and visual and hearing problems

### WHAT'S THEIR DEATH RATE IN INDIA?

An estimated **3 lakh preterm babies die every year**, according to a statement made by health minister last year in the Parliament

#### TOP 10 COUNTRIES WITH THE GREATEST NUMBER OF PRETERM BIRTHS...



**Increasing preterm birth rates mean an increased need for donor milk. Preterm infants are most in need of human milk, yet their moms are the least likely to be able to provide what they need in the earliest days of life.**

### CAN BREAST MILK SAVE THEIR LIVES?

**Yes, to a large extent.** Without breast milk during their first two weeks of life, premature infants are left wanting for antibodies and are vulnerable to infections and diseases that result in death. In India almost 50% of preterm babies die under 28 days.

### HOW DOES BREAST MILK HELP?

**Packed with nutrients,** breast milk helps build the immune system and is the ideal food for a baby. Plus, human milk is always sensitive and compatible to feeding the 'just from surgery' stomach of the infant.

### WHO CAN DONATE BREAST MILK?

**Any lactating woman,** who is in good physical and mental health and not on any medications or drugs and has an excess amount of milk after satisfactorily feeding her baby, is eligible to donate her milk

### HOW IS BREAST MILK COLLECTED IN INDIA?

**Breast milk** is pumped by the mother using a breast pump in her house. The milk is then stored in sterile containers provided by the milk bank, which then picks up the milk.

### WHAT HAPPENS TO DONATED MILK?

**Once** it reaches the bank, it is pasteurised, and is further tested to make sure it is free of any infection. This milk is then dispatched for the preterm infants as and when the need arises



Source: WHO, SABR, Amaara



#### TRIVIA...

**BRAZIL** has the largest network of breast milk donors in the world

**1.66 LAKH** women donated milk in 2014

**217** milk banks

**126** MILK collection points

**MAY 19TH** IS celebrated as National Day of Human Milk Donation

Milk bank system is often cited as a key factor in Brazil's 73% decline in infant mortality over the past two decades, from 63.2 per 1,000 births in 1985 to 19.6 in 2013

#### DID YOU KNOW?

**1,569.79 litres**

**THAT'S THE GUINNESS BOOK RECORD** for most milk donated by an American, Alyse Ogletree, from January 11, 2011 to March 25 2014

**ASIA'S FIRST MILK BANK** was established at Lokmanya Tilak Hospital in Mumbai in November 1989

**WORLD'S FIRST MILK BANK** was opened in Vienna in 1911

Source: Milkgenomics.org, BJMC Pune

170 -  
160 -  
150 -  
140 -  
130 -  
120 -  
110 -  
100 -  
90 -  
80 -  
70 -  
60 -  
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**05.03.2025**

## **What does 'Navratna' status for IRCTC and IRFC mean?**

- ▽ The centre on Monday approved the upgradation of Indian Railway Catering and Tourism Corporation (**IRCTC**) and Indian Railway Finance Corporation (**IRFC**) as the country's 25<sup>th</sup> and 26<sup>th</sup> Navratna companies respectively.
- ▽ All seven **listed** Central Public Sector Enterprises (CPSEs) of the Indian Railways now have Navratna status.
  - The Indian Railways have a total 12 CPSEs.

- ☐ **Total 14 Mahaaratna companies at present**
- ☐ **Total 26 Navaratna companies at present**
- ☐ **Total 62 Miniratna companies at present**

## **When does a company get Navratna status?**

- ▽ Navratnas are the second category of the Central government-owned 'Ratna' companies, placed between the Maharatnas and the Miniratnas,
  - based on criteria including
    - ~ profitability,
    - ~ net worth,
    - ~ earning,
    - ~ inter-sectoral performance, etc.
- ▽ The **Department of Public Enterprises (DPE)** of the Ministry of Finance picks the CPSEs for Navratna status,
  - Six indicators are considered:
    - Ratio of net profit to net worth
    - Ratio of manpower cost to total cost of production or services
    - Ratio of profit before depreciation, interest, and tax (PBDIT) to capital employed or return on capital employed
    - Ratio of profit before interest and taxes (PBIT) to turnover
    - Earning per share
    - Inter-sectoral performance of the company
- ▽ The six indicators carry weights from 10 (for earning per share) to 25 (for ratio of net profit to net worth).





A PSU in India is a government-owned corporation where the government holds a **majority stake** (51% or more).

## (PUBLIC SECTOR UNDERTAKINGS)



### Key Roles and Importance

#### Economic Growth

PSUs contribute significantly to GDP, employ a large workforce, and develop infrastructure.



#### Public Welfare

They ensure that essential services such as electricity, water, and healthcare are provided at reasonable rates.



#### Strategic Sectors

Operate in critical areas like defense, energy, mining, and telecommunications.



### Types of PSUs

©PMF IAS

Maharatnas are the largest and most financially sound CPSEs in India, with significant **operational autonomy** and the potential to become global giants. Maharatna companies have extensive decision-making powers, particularly in areas like investment and expansion.

#### CRITERIA

Must have Navratna status

Listed on Indian stock exchanges with required public shareholding.

**Turnover:** ₹25,000 crore+ (3-year avg)

**Net worth:** ₹15,000 crore+ (3-year avg)

**Net profit:** ₹5,000 crore+ (3-year avg)

Must have a significant global presence.

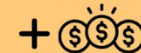
Miniratna companies are financially sound CPSEs that have been granted operational autonomy. There are two categories: **Category-I and Category-II**. These companies have a **limited scope of autonomy** compared to Navratna and Maharatna companies.

#### CRITERIA

##### (MINIRATNA- I)

CPSEs must have made a **profit** for the **last three consecutive years**.

Pre-tax profit should be **₹30 crore or more** in at least one of those years.



The company must have a positive net worth.

##### (MINIRATNA- II)

Made a **profit** for the **last three consecutive years**.

Maintained a positive net worth.



Navratna companies are CPSEs that have demonstrated strong financial performance and management. They are given **more autonomy than Miniratna** companies but slightly less than Maharatnas, particularly in matters of investment and expansion.

#### CRITERIA

©PMF IAS



Miniratna-I and **Schedule 'A'** status.



Three '**Excellent**' or 'Very Good' **MoU** ratings in the last five years.

#### SCORE 60+ POINTS BASED ON SIX PERFORMANCE PARAMETERS

| Net profit to net worth | Manpower cost to production | PBDIT to capital employed | PBIT to turnover | Earnings per share | Inter-sectoral performance |
|-------------------------|-----------------------------|---------------------------|------------------|--------------------|----------------------------|
| (25 points)             | (15 points)                 | (15 points)               | (15 points)      | (10 points)        | (20 points)                |

| Criteria for Maharatna Status                                                     | Criteria for Navratna Status                                                                                                                                    | Criteria for Miniratna Status                                                                                                                                                                                                                                                                                                                                                              |
|-----------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1. Shall have <b>Navratna status</b>                                              | 1. Miniratna Category - I or Schedule 'A' CPSEs                                                                                                                 | Miniratna Category-I status: <ul style="list-style-type: none"> <li>• <b>Made profit</b> in the last 3 years continuously</li> <li>• <b>Pre-tax profit is Rs.30 crores</b> or more in at least 1 of the 3 years</li> <li>• Having <b>Positive net worth status</b></li> </ul>                                                                                                              |
| 2. <b>Listed on the Indian stock exchange</b> with prescribed public shareholding | 2. 'Excellent' or 'Very Good' rating in 3 of last 5 years                                                                                                       |                                                                                                                                                                                                                                                                                                                                                                                            |
| 3. <b>Average annual turnover</b> > Rs. 25,000 crore (last 3 years)               | 3. <b>Composite score of 60 or above</b> in the following 6 performance indicators including Net Profit to Net Worth, Cost of Services, Earning per share, etc. | Miniratna Category-II status: <ul style="list-style-type: none"> <li>• <b>Made profit</b> for the last 3 years continuously</li> <li>• Having <b>positive net worth status</b>.</li> <li>• <b>Not defaulted</b> in the repayment of loans/interest payment on any loans due to the Government.</li> <li>• <b>Not dependent upon budgetary support</b> or Government guarantees.</li> </ul> |
| 4. <b>Average annual net worth</b> > Rs. 15,000 crores (last 3 years)             |                                                                                                                                                                 |                                                                                                                                                                                                                                                                                                                                                                                            |
| 5. <b>Average annual net profit after tax</b> > Rs. 5,000 crores (last 3 years)   |                                                                                                                                                                 |                                                                                                                                                                                                                                                                                                                                                                                            |
| 6. Significant global <b>presence/international operations</b>                    |                                                                                                                                                                 |                                                                                                                                                                                                                                                                                                                                                                                            |

**06.03.2025**

## What the **first-ever comprehensive survey of India's river dolphins** found

▽ It estimated the aquatic mammals' population to be 6,327, spread mostly across the Ganga and Brahmaputra river systems.

▽ The Indian subcontinent boasts two extant species of riverine dolphins:

|                                 |                             |                                                                                       |
|---------------------------------|-----------------------------|---------------------------------------------------------------------------------------|
| the <b>Gangas river dolphin</b> | and the related but smaller | <b>Indus river dolphin</b> (Platanista gangetica), <b>dolphin</b> (Platanista minor). |
|---------------------------------|-----------------------------|---------------------------------------------------------------------------------------|

▽ Both are classified as **endangered**, and accorded the highest protection under the Wildlife Protection Act, 1972.

→ They face threats from

pollution,  
riverbed mining,  
excessive damming,  
low water depth,  
habitat damage,  
prey decline, and  
climate change.

▽ Since river dolphins live in

opaque, turbid waters and surface only briefly,  
making estimates of their population is not easy.

→ According to the report, the length of an average dive is 107 seconds, after which the mammals surface for only 1.26 seconds.

→ Not only is it difficult to sight all surfacing dolphins, not all dolphins may surface at the time surveyors are at work.

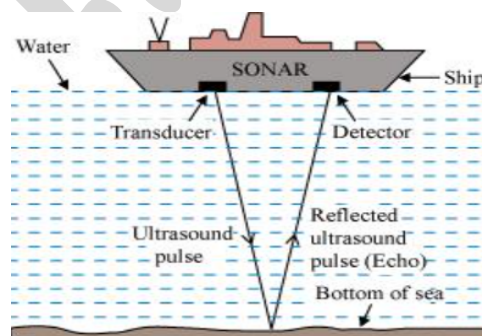
▽ To get over this problem, a **combination of visual and acoustic surveys was used.**

### Acoustic Survey:

→ Being functionally blind, dolphins navigate using echolocation, the same principle used by SONAR aboard submarines.

The mammals make clicking sounds which bounce back after hitting objects.

An acoustic survey uses **multiple underwater microphones** (or hydrophones) to capture these clicks, in order to counter observer error.





### ⇒ Sonar is used for:-

Sonar, or Sound Navigation and Ranging, uses sound waves

- ~ to detect and locate objects underwater,
- ~ measure distances, and map the seafloor,
- ~ aiding in navigation, underwater exploration, and scientific research.

### Visual Surveys:

- Depending on the vessel available, water depth and channel width, different kinds of visual surveys can be deployed.
  - **For deep and wide channels**, the double observer method was used, in which two teams positioned on different decks covered different angles around the vessel, scanning for dolphins surfacing around them as the boat travelled at a speed of 8-10km/hour.
  - The boat's speed, which is faster than that of a dolphin, prevents double counting.

### Key findings

- Only three Indus river dolphins were identified, all in the Beas in Punjab.
  - The rest of the population – 6,324 dolphins – belonged to the larger species, and were found in the Ganga and Brahmaputra river systems.
- Some 3,275 dolphins were estimated to be living in the Ganga's main channel, with another 2,414 residing in its tributaries. An estimated 584 dolphins resided in Brahmaputra's main channel, and another 51 in its tributaries.
- Uttar Pradesh (2,397) and Bihar (2,220) boasted the largest populations of the Ganges river dolphin, followed by West Bengal (815), Assam (635), Jharkhand (162), and Rajasthan and Madhya Pradesh (95).
- But not all stretches of the river were equally populated. The survey identified dolphin '*hotspots*' and '*coldspots*'.

### □ 3 Type of Dolphins in India

- Gangetic Dolphin:- The Gangetic dolphin, also called the Ganges river dolphin, is a freshwater dolphin found in the Ganges-Brahmaputra-Meghna and Karnaphuli-Sangu river systems in **Nepal, India, and Bangladesh.**
- Indus River Dolphin:- Indus River Dolphin.
- Irrawaddy Dolphins:- Irrawaddy dolphin.

### Highest to lowest population:-

#### **River wise**

1. Ganga (main channel)
2. Ganga (tributaries)
3. Brahmaputra (main channel)
4. Brahmaputra (tributaries)
5. Indus (Beas in Punjab)

#### **State wise**

1. UP
2. Bihar
3. WB
4. Assam
5. Jharkhand
6. Rajasthan and MP

07.03.2025

## **Why Vanuatu boasts one of the most popular 'golden passport' schemes**

**Context:-** Former IPL chief Lalit Modi has applied to surrender his passport to the Indian High Commission in London, and acquired the citizenship of Vanuatu, *a tiny island nation in the South pacific*, the Ministry of External Affairs confirmed on Friday.

→ Vanuatu has a **popular citizenship by investment (CBI)** or “**golden passport**” program, which allows wealthy individuals to purchase its passport.

→ Later revoked by Vanuatu Govt.

### **Buying citizenship**

- CBI or economic citizenship allows individuals to acquire citizenship in a country **by making significant financial contributions to its economy.**
- > Countries around the world offer foreigners citizenship to attract investment and stimulate economic growth.

- [

Malta,  
Turkey,  
Montenegro,  
Antigua and Barbuda,  
Dominica, and  
Egypt

 also have CBI programs.

- “Vanuatu’s citizenship by investment program is the fastest and most simple citizenship program available...”
  - Very few documents are required, and all documentation can be provided **digitally**, meaning **the applicant does not even have to set foot in the country to become a citizen.**

## Specific advantages

- ▽ Aside from the ease and speed of the process, Vanuatu’s program provides some specific benefits.
  - As of 2025, a Vanuatu’s passport allows visa-free entry to 113 countries.
    - ~ The Henley Passport Index ranks the Vanuatu passport as the 51st strongest in the world (out of 199 countries), ahead of Saudi Arabia (57), China (59), and Indonesia (64). India ranks 80<sup>th</sup>.
    - ~ Vanuatu’s passport was even stronger until March 2022 when the **European Council** temporarily suspended its visa-free access to the European Union due to security concerns around the golden passport scheme. **The suspension was made permanent in February 2023.**
  - Vanuatu is, for all intents and purposes, a **tax haven.**
    - ~ It is a **zero-tax jurisdiction** that is free of personal income tax, capital gains tax, inheritance tax, and wealth tax.
    - ~ While Vanuatu does charge **indirect taxes** such as VAT, as well as tax on property transactions, **rates are typically lower** than other countries in the South Pacific.
    - ~ It also has **lax reporting requirements**, which make it a “strategic jurisdiction” for tax purposes.
- ▽ For what remains a very poor country, with a per capita GDP (current US\$) of only 3,515.2 (World Bank, 2023), there is a major financial incentive to be a tax haven.
  - **Offshore financial services is one of the biggest revenue-generators for the country.**

## Scandals in recent years

In recent years, Vanuatu has faced multiple corruption scandals and allegations that its citizenship scheme and tax law are being used by global criminal syndicates.

## Quick Look :-

- ▽ Vanuatu, a string of more than 80 islands in the southern Pacific Ocean, has a **population** of about **3lakh people.**
  - It achieved independence from **France and Britain in 1980.**
  - Vanuatu offers citizenship through its Citizenship by Investment programme, requiring a non-refundable donation or investment.

- According to the Capital Investment Immigration Plan, for single applicants, the amount is USD 155,000 (Rs 1.3crore), making it one of the cheapest options to acquire citizenship.

# What USAID gives, to whom

USAID has been a major contributor to health- and population-linked projects in India over the last two decades. Since 2001, USAID has disbursed a total \$2.8 billion in Official Development Assistance to India

## USAID's India projects under threat

### HEALTH

**Momentum 3B for Overcoming Entrenched Obstacles in Routine Immunization**

**GOAL:** Strengthen immunisation programs, remove bottlenecks in planning, delivery, demand, uptake of immunisation services.

**FUNDING:** \$20,596,671

**SCHEDULED END:** June 2026

**Reaching Impact, Saturation and Epidemic Control (RISE)**

**GOAL:** Five-year PEPFAR-USAID-funded project to reduce new HIV infections, HIV-related morbidity & mortality.

**FUNDING:** \$7,163,483

**SCHEDULED END:** December 2025

**Suwasi: Support To Water and Sanitation in India**

**GOAL:** Support sustainable sanitation and safe drinking water in pursuit of sustainable development goals.

**FUNDING:** \$4,050,001

**SCHEDULED END:** March 2026

### ENVIRONMENT

**Strengthening Landscape Management and Conservation**

**GOAL:** Five-year program that supports Government of India, other stakeholders in protecting landscapes, improving biodiversity conservation.

**FUNDING:** \$2,695,142

**SCHEDULED END:** April 2028

**Cleaner Air and Better Health**

**GOAL:** Improve air quality and reduce air pollution exposure in selected Indian locations.

**FUNDING:** \$1,500,000

**SCHEDULED END:** October 2026

### BASIC EDUCATION

**Scaling up Early Learning**

**GOAL:** Facilitate creation of reading rooms to improve basic education.

**FUNDING:** \$2,115,879

**SCHEDULED END:** September 2025

**Udyami: Building Resilience of Women Micro-entrepreneurs**

**FUNDING:** \$3,000,000

**SCHEDULED END:** November 2027

### ENERGY

**South Asia Regional Energy Partnership (SAREP)**

**GOAL:** Improve access to affordable, secure, reliable and sustainable energy in South Asia.

**FUNDING:** \$5,196,278

**SCHEDULED END:** September 2028

### BUSINESS

**O-RAN Research Labs**

**GOAL:** To explore creation of a tech platform for secure and trustworthy alternate 5G O-RAN; part of US efforts to facilitate "free and open Indo-Pacific".

**FUNDING:** \$3,300,000

**SCHEDULED END:** September 2025

### GOVT & CIVIL SOCIETY

**Central Tibetan Administration Capacity Building & Sustainability Initiative**

**GOAL:** Strengthen Central Tibetan Administration for delivering services to Tibetans and achieving community self-reliance.

**FUNDING:** \$2,898,081

**SCHEDULED END:** August 2026

### OTHER SOCIAL STRUCTURE

**Development Partnership Activity for Indo Pacific Region**

**GOAL:** Partnership between USAID and Indian development agencies to provide technical assistance to countries in the Indo-Pacific region in the areas of energy, natural resource management, digital technology, connectivity, trade and competitiveness.

**FUNDING:** \$1,676,960 (2024),

\$962,488 (2023), \$881,455 (2022)

**SCHEDULED END:** August 2025

**10.03.2025**

## **HANTAVIRUS**

Nearly two weeks after actor Gene Hackman and his pianist wife Betsy Arakawa were found dead in their home in Santa Fe, New Mexico, officials on Friday said Hackman died of heart disease days after Arakawa succumbed to **hantavirus pulmonary syndrome (HPS).**

### **What is hantavirus?**

- ▽ Hantavirus is a family of **rodent-borne viruses** that can cause serious illness, **even death, in humans.**
  - Infected rodents **spread the viruses through their urine, faeces, and saliva,** according to the US Centers for Disease Control and Prevention (CDC).
  - The virus **does not spread via people-to-people contact.**
- ▽ The specifics of the virus, and the disease it causes, depends on the region and the rodent host that carries it.
  - **HPS** is **endemic** to the **Western Hemisphere** where the **most common** hantavirus strain causing the disease is carried by the deer mouse.
  - Haemorrhagic fever with renal syndrome (**HFRS**) is another group of illnesses caused by hantaviruses found primarily in **Europe and Asia.**
  - Among these, the **Hantaan** (after which hantavirus is named) and **Dobrava strains are most dangerous.**

### **What are the symptoms of HPS?**

- ▽ **Flu-like symptoms** present one to eight weeks after exposure.
  - This includes
    - ~ fatigue,
    - ~ fever and
    - ~ muscle aches.
    - As the disease advances, the infected person may experience **respiratory difficulties as the lungs fill with fluid.**
- ▽ The CDC estimates that 38% of those who develop respiratory symptoms die from the disease. The mortality for the hantavirus strain in southwestern US – where Arakawa died – ranges from 38% to 50%.

**(Summary :- Mortality rate too high)**



## Can HPS be cured?

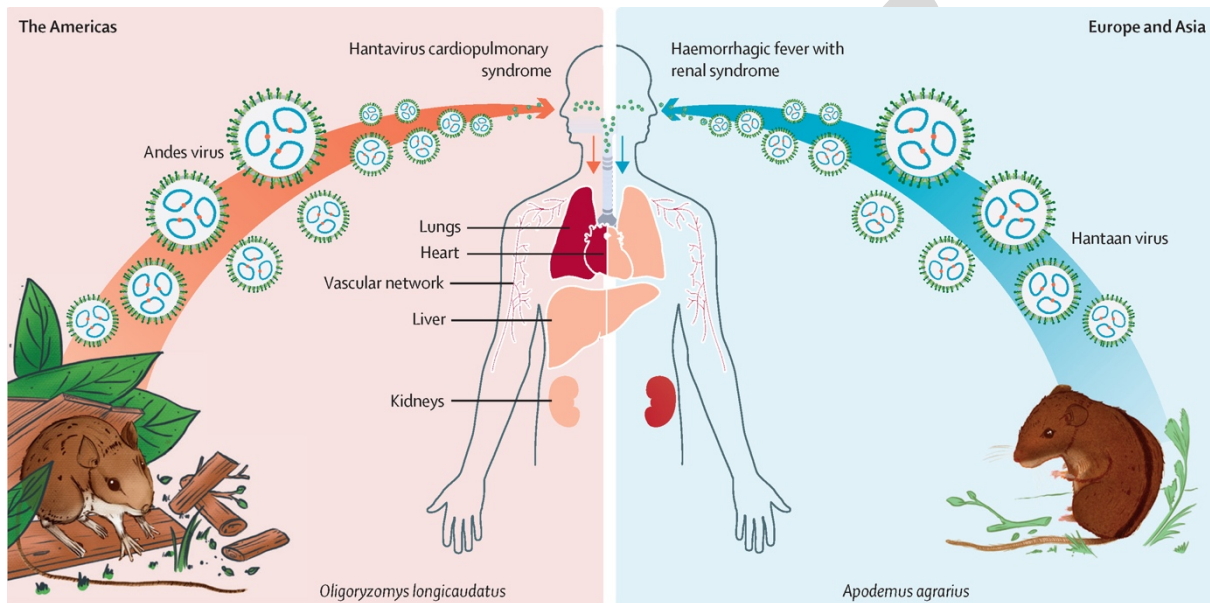
▽ There is **no known cure for HPS**.

→ **Early detection and treatment** are crucial – some **antivirals** may help manage the symptoms, and patients can benefit from respiratory support.

▽ Advise for people living in areas known to house hantavirus-infected rodents

→ **to clean any excrement with a wet paper towel, gloves, and a tight-fitting N95 mask.**

→ **use of commercial disinfectants to sanitise the area with rodent droppings.**



## Rodent-borne disease

Hantavirus Pulmonary Syndrome is a life threatening disease spread to humans in California most often by deer mice. The symptoms are similar to influenza.

① Virus found in deer mice feces, urine and saliva



② Infected dropping become airborne

### Symptoms

#### Early

- Chills
- Fever
- Muscle aches

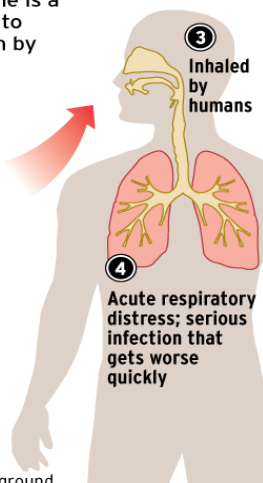
#### Later, 1-2 days

- Dry cough
- Headache
- Nausea, vomiting
- Shortness of breath

### Stay clear

- Most prevalent in rural areas
- Campers and hikers more likely to catch disease because tents rest on the ground
- Cannot be spread between humans

Source: U.S. Centers for Disease and Control



McClatchy Tribune



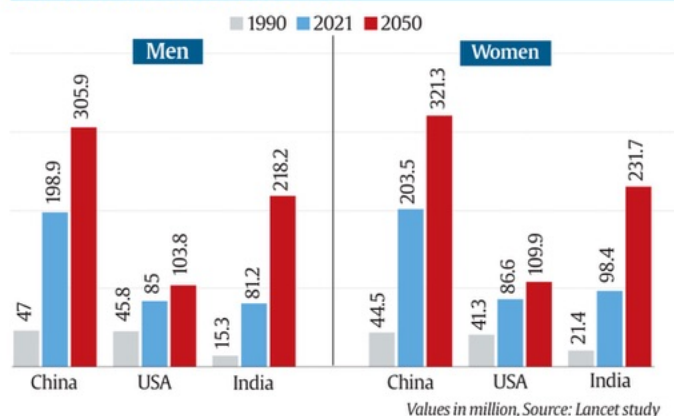
# India's obesity problem

The number of overweight and obese people is on the rise in India, including children and adolescents. Reversing this trend, which raises a variety of health concerns, requires action on multiple fronts

## WHO IS MOST AT RISK, WHERE IN THE WORLD

| CATEGORY                                             | YEAR 1990 |        | YEAR 2021 |         | YEAR 2050 |         |
|------------------------------------------------------|-----------|--------|-----------|---------|-----------|---------|
|                                                      |           |        |           |         |           |         |
| <b>CHILDREN AND YOUNG ADOLESCENTS (5 - 14 YEARS)</b> |           |        |           |         |           |         |
| Boys                                                 | China     | 7.3 mn | China     | 19.5 mn | China     | 19.5 mn |
|                                                      | USA       | 4.6 mn | India     | 13.3 mn | India     | 16.1 mn |
|                                                      | India     | 4.6 mn | USA       | 7.6 mn  | Nigeria   | 12.5 mn |
| Girls                                                | China     | 5.4 mn | China     | 13.9 mn | China     | 14.8 mn |
|                                                      | India     | 4.5 mn | India     | 12.4 mn | India     | 14.4 mn |
|                                                      | USA       | 4.2 mn | USA       | 7.5 mn  | Egypt     | 10.6 mn |
| <b>OLDER ADOLESCENTS (15-24 YEARS)</b>               |           |        |           |         |           |         |
| Young men                                            | China     | 9.1 mn | India     | 16.8 mn | India     | 22.7 mn |
|                                                      | USA       | 6.1 mn | China     | 16.3 mn | China     | 19.5 mn |
|                                                      | India     | 4 mn   | USA       | 10.5 mn | Nigeria   | 14 mn   |
| Young women                                          | China     | 6.9 mn | India     | 13 mn   | India     | 16.9 mn |
|                                                      | USA       | 4.8 mn | China     | 11.4 mn | China     | 14.8 mn |
|                                                      | India     | 3.3 mn | USA       | 10.9 mn | USA       | 11.9 mn |

### ADULTS OVER THE AGE OF 25 YEARS



**11.03.2025**

## **Farm lending: Kisan Credit Card bad loans rise by 42% in four years**

▽ The NPA classification in the KCC segment is different from other retail loans,

| Retail Loans                                                                                                                                                   | KCC Loans                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <ul style="list-style-type: none"><li>an account becomes an NPA if interest and instalment of principle remain overdue for more than <b>90 days</b>.</li></ul> | <ul style="list-style-type: none"><li>The repayment period for KCC loans is <b>as per the crop season</b> (<i>short or long</i>) and marketing period for the crop.</li><li>The <b>crop season</b> for states is decided by the respective <b>State Level Bankers Committee (SLBC)</b>.<ul style="list-style-type: none"><li>For short duration crops, the crop season is <b>12 months</b> and for long duration crops it is <b>18 months</b> in most states.</li></ul></li><li>If a KCC loan is not paid within <b>three years</b> of disbursal, it will be classified as NPA.</li></ul> |

▽ Introduced in **1998**, the Kisan Credit Card (KCC) scheme provides

adequate and timely access to credit to farmers for  
**agricultural and other allied activities**.

→ KCC offers a revolving cash credit facility to farmers, without any restrictions on the number of debit or credits.

→ **KCC loans** are part of the overall agriculture loan book of banks, which **comes under the priority sector lending (PSL) book of banks**.

○ Of the overall **PSL target of 40 per cent**, banks are mandated to achieve an **agriculture target of 18 per cent**.

- ▽ Experts attribute the rise in defaults in the KCC segment of scheduled commercial banks to various factors including
  - inability of farmers to repay loans due to weather-related damages to crops,
  - lack of awareness among farmers about repayment timelines,
  - delay in payments due to exigencies related to personal household requirement, and
  - weak loan recovery mechanism for banks.
  
- ▽ Since agriculture is *subject to the vagaries of weather*, any natural calamity can affect crops.
  - In such cases, **inadequate crop insurance or no crop insurance**, owing to higher premium, also impacts farmers' loan repayment capabilities.
  - Besides, *expectations of firm loan waiver ahead of any state election* often distorts the repayment behaviour of farmers in hope of some relief from the government, bankers said.
  - When it comes to *recovery of agricultural loans, even banks go slow* as any harsh step could stir up a hornet's nest, since it becomes a political subject.
  - *Farmers' suicides* further deter lenders from taking aggressive recovery steps in case of defaults.
  
- ▽ Under the KCC scheme, farmers can draw the credit limit using various delivery channels such as ATM/debit card and business correspondents.
  - **The card is valid for five years.**
  
- ▽ The Centre, under **Modified Interest Subvention Scheme (MISS)**, provides interest subvention of 1.5 per cent to banks for providing short-term agriculture loans through KCC up to Rs 3lakh at a concessional interest rate of 7 per cent per annum.
  - An additional prompt repayment incentive of 3 per cent is provided to farmers on timely repayment of loans, **which effectively reduces the rate of interest to 4 per cent for farmers.**
  
- ▽ In the **Budget 2025-26**, Finance Minister Nirmala Sitharaman had announced to **increase the loan limit under the MISS from Rs 3lakh to Rs 5lakh.**
  
- ▽ **Loans up to Rs 2 lakh are extended on a collateral-free basis**, ensuring hassle-free access to credit for small and marginal farmers.
  
- ▽ The **maximum outstanding amount** under the KCC scheme across all banks (SCBs, cooperative banks and regional rural banks), in 2024.
  1. Uttar Pradesh
  2. Rajasthan
  3. Madhya Pradesh

4. Maharashtra
5. Gujarat and
6. Karnataka.

## Kisan Credit Card





### KISAN CREDIT CARD (KCC) SCHEME

The KCC Scheme was introduced with the objective of providing adequate and timely credit to the farmers for their agricultural operations. The Government of India provides interest subvention of 2% and Prompt Repayment Incentive of 3% to the farmers, thus making the credit available at a very subsidized rate of 4% per annum.

The scheme was further extended for the investment credit requirement of farmers viz. allied and non-farm activities in the year 2004 and further revisited in 2012 by a working Group under the Chairmanship of Shri T. M. Bhasin, CMD, Indian Bank with a view to simplify the scheme and facilitate issue of Electronic Kisan Credit Cards. The scheme provides broad guidelines to banks for operationalizing the KCC scheme. Implementing banks will have the discretion to adopt the same to suit institution/location-specific requirements.

Directorate of Information and Public Relations, J&K

## FEATURES OF KISAN CREDIT CARD

- |                                                                                                                                                     |                                                                                                                                                                 |                                                                                                                                                                                                     |                                                                                                                                                                             |
|-----------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <div style="background-color: orange; border-radius: 10px; padding: 5px; display: inline-block;"><b>01</b></div><br><b>Revolving credit</b>         | <div style="background-color: yellow; border-radius: 10px; padding: 5px; display: inline-block;"><b>02</b></div><br><b>Flexible payments</b>                    | <div style="background-color: green; border-radius: 10px; padding: 5px; display: inline-block;"><b>03</b></div><br><b>Simple process</b>                                                            | <div style="background-color: lightblue; border-radius: 10px; padding: 5px; display: inline-block;"><b>04</b></div><br><b>Insurance coverage upto Rs 50,000</b>             |
| <div style="background-color: purple; border-radius: 10px; padding: 5px; display: inline-block;"><b>05</b></div><br><b>Complimentary debit card</b> | <div style="background-color: pink; border-radius: 10px; padding: 5px; display: inline-block;"><b>06</b></div><br><b>Credit limit extension on good records</b> | <div style="background-color: limegreen; border-radius: 10px; padding: 5px; display: inline-block;"><b>07</b></div><br><b>Also cover tenant farmers, joint liability groups &amp; sharecroppers</b> | <div style="background-color: magenta; border-radius: 10px; padding: 5px; display: inline-block;"><b>08</b></div><br><b>Now includes fisheries &amp; animal husbandries</b> |

**13.03.2025**

## **STARLINK**

**A network of satellites that provides Internet operated by SpaceX, billionaire Elon Musk's aerospace company**

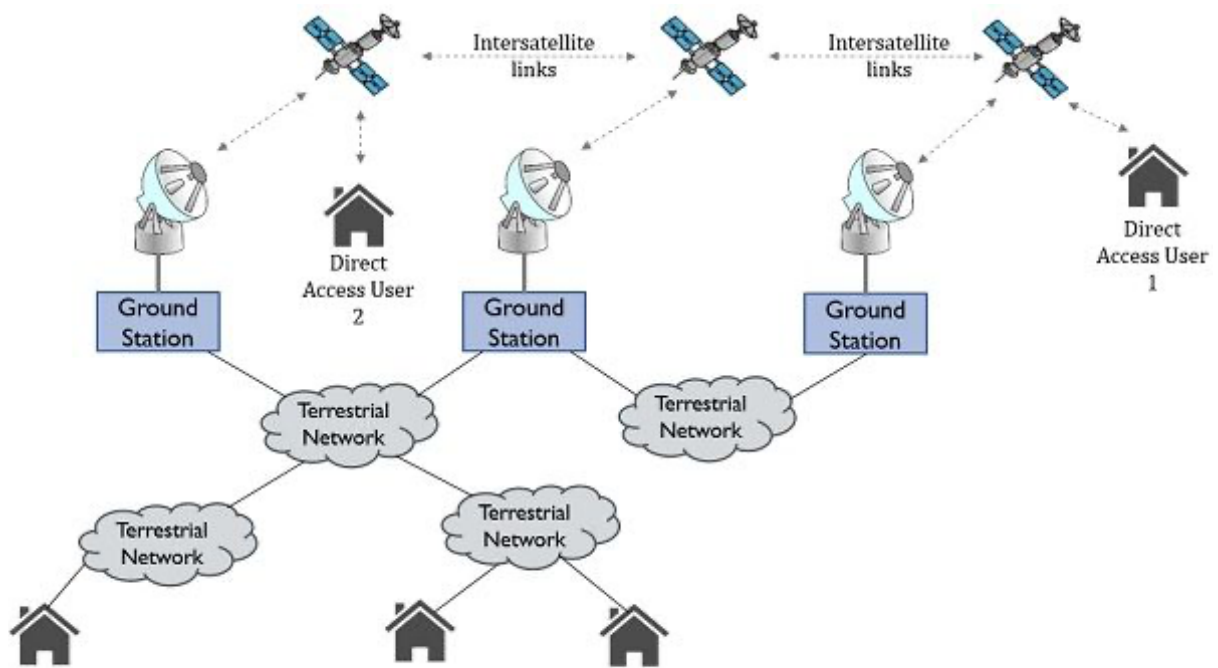
**Bharti Airtel and Reliance Jio** have signed separate deals with Elon Musk's SpaceX to bring the Starlink Internet service to India. SpaceX's application for a security clearance is currently being reviewed by the Union Home Ministry.

### **What is Starlink?**

- Starlink is a **network of satellites that provides Internet connectivity**.
  - Operated by **SpaceX**, it was launched in **2019**.
  - Starlink eventually aims to shoot 42,000 small satellites into space, forming a globe-encircling ring just 547km overhead.
  - Currently, project has around 7,000 mass-produced **small satellites in low Earth orbit (LEO)** – *an orbit that is under altitudes of 2,000km.*
- By the end of 2024, Starlink had more than 4.6 million users in over 100 countries – it began the year with only 2.3 million users globally.
- In the **US**, Starlink offers **speeds up to 220 Mbps**.
  - However, the service is **quite expensive**.
  - The monthly rate on mobile service is cheaper but the expected speeds are slower.

### **How does satellite Internet work?**

- Satellite Internet operates by sending signals from the user's device to a satellite in space, which then passes on the data to a ground station connected to the Internet.
  - The ground station retrieves the requested data and sends it back through the satellite to the user's dish, completing the connection.
  - **This whole process does not require cable, fibre or phone lines.**
- The user just needs a modem and a satellite dish. The modem needs to be connected to that dish to translate the incoming signal into a workable internet connection.



**Satellite-based Internet with ISL architecture**

### Why are the Starlink deals significant?

- Starlink can provide a practical solution for broadband in underserved areas in India, where the traditional ways to deliver the Internet – fibre-optic cables or wireless networks – are scarce or unavailable.
  - It can help **bridge the digital divide** by bringing high-speed Internet to the remotest corners of the country.
- Although **India is the world's second-largest Internet market**, more than 670 million of its 1.4 billion people have no access to the Internet, according to 2024 report by GSMA, a trade body representing mobile network operators worldwide.

| TO EVALUATE MARKET DYNAMICS                                                                                                                                                     |                                                                                                                                                                                                             |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>CURRENTLY, SATELLITE</b> signals cannot be received directly on standard mobile devices, and satcom services are significantly more expensive than conventional mobile plans | market dynamics and the role of satcom operators in bridging the digital divide                                                                                                                             |
| <b>BY RESTRICTING</b> satellite services to areas lacking mobile coverage, Trai would be able to evaluate                                                                       | <b>FIVE COMPANIES</b> are vying to provide satellite Internet services: Eutelsat OneWeb, Jio-SES, Starlink, and Amazon Kuiper. Bharti-backed OneWeb and Jio-SES have already received regulatory clearances |



**15.03.2025**

ISRO undocks satellites, shot  
in arm for its future missions

**EXPLAINED**

**E** Why this capability is key

THE CAPABILITY to dock and undock in space is key to Chandrayaan-4 which is to bring back samples from the Moon. For the Bharatiya Antariksha Station, five modules will be launched separately and joined in space to create the space station.

(Detailed discussion @ CA Exclusive 2025(Part-1) @ pg.no.:- 36-38)

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**20.03.2025**

# SPLASHDOWN

NASA astronauts Sunita Williams and Butch Wilmore, whose eight-day ISS mission stretched to over 9 months, splashed down in the waters off Florida in a Space X capsule on Wednesday. Also in the spacecraft were NASA's Nick Hague and Russian cosmonaut Aleksandr Gorbunov.



(Clockwise from top) The SpaceX Dragon capsule carrying NASA astronauts Sunita Williams, Butch Wilmore and Nick Hague, and Russian cosmonaut Aleksandr Gorbunov, lands off Florida; teams onboard a SpaceX ship raise the Dragon spacecraft; Williams at NASA's Johnson Space Centre; and the four spacefarers inside the craft after landing. NASA, PTT

## HOW IT UNFOLDED



**5:05 AM GMT** the Dragon capsule detaches from the ISS to begin its journey back to Earth



**9:57 PM GMT** the spacecraft slows from more than 17,000 miles an hour. Four large parachutes gently ease the capsule into the sea



**RECOVERY TEAMS** help hoist the capsule onto a waiting ship and place it on a basket called the 'nest'

**THE CAPSULE** opens, the astronauts are helped out

**THE ASTRONAUTS** fly to Houston's Johnson Space Center for a few days of routine health checks

AGENCIES

### Look Back:-

- The two expected to be gone just a week or so after launching on **Boeing's** new **Starliner** crew capsule on June 5.
- So many problems cropped up on the way to the space station (**thruster issue and helium leaks**) that NASA eventually sent Starliner back empty and transferred the test pilots to **SpaceX's Dragon**, pushing their homecoming into February.
- Then SpaceX capsule issues added another month's delay.

### Quick Look:-

#### International Space Station (ISS)

- ❑ Launched in **1998**
- ❑ The International Space Station (ISS) is a collaborative, orbiting research laboratory in **low Earth orbit**, assembled and maintained by a partnership of **five space agencies**:
  - 1) **NASA (USA)**,
  - 2) **Roscosmos (Russia)**,
  - 3) **ESA (EU)**,
  - 4) **JAXA (Japan)**, and
  - 5) **CSA (Canada)**.
- ❑ Research Focus: The ISS provides access to a persistent microgravity environment, allowing scientists to study various phenomena, including the effects of space on human physiology, materials science, and Earth observation.
- ❑ Spacewalks: Astronauts and cosmonauts regularly conduct spacewalks for space station construction, maintenance, and upgrades.
- ❑ Visitors: To date, 283 individuals from 22 countries have visited the International Space Station.
- ❑ Future Missions: The ISS is a crucial stepping stone for future missions, including those aimed at exploring the Moon and Mars.

Astronauts experience weightlessness due to constant freefall around Earth,  
not because gravity is absent

**25.03.2025**

## **India and TB**

Ministry of Information and Broadcasting  
Government of India

**What is TB?**

 **Tuberculosis (TB)** is a contagious airborne disease caused primarily by *Mycobacterium tuberculosis*. It most often affects the lungs but can also impact other body parts.

**How TB Spreads?**

 **TB spreads** through the air when individuals with lung TB cough, sneeze, or spit, releasing infectious droplets. Alarmingly, inhaling just a few bacteria is enough to cause infection. TB is curable and preventable.

Ministry of Information and Broadcasting  
Government of India

**The two main types of tuberculosis (TB) are:**

- 1. Pulmonary TB:** This type of TB affects the lungs. It is the most common form and is contagious, spreading through airborne droplets when an infected person coughs or sneezes.
- 2. Extrapulmonary TB (EPTB):** This occurs outside the lungs, affecting organs like lymph nodes, bones, brain, kidneys, or the pleura. It is less contagious and usually spreads within the body from the lungs.

### **WHY THIS MATTERS**

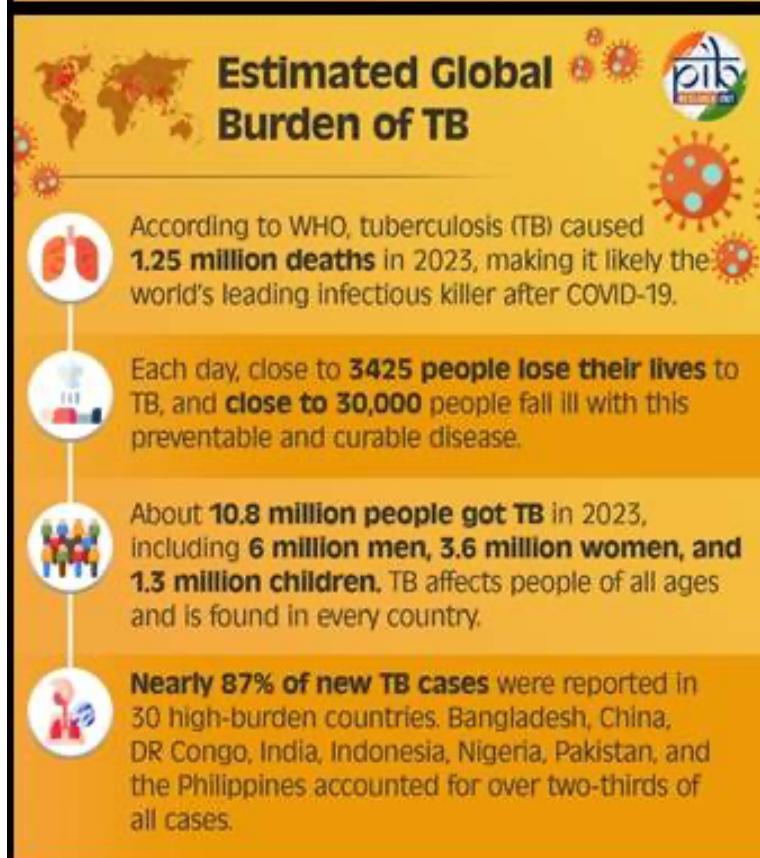
India accounts for **26%** of global TB cases, **29%** of deaths due to TB

#### **INDIA TB REPORT**

|                     | 2023   | 2024   |
|---------------------|--------|--------|
| Estimated TB cases  | 27.4 L | 27.8 L |
| Cases reported      | 24.2 L | 25.5 L |
| Estimated mortality | 3.2 L  | 3.2 L  |

Source: Global TB Report, India TB Report



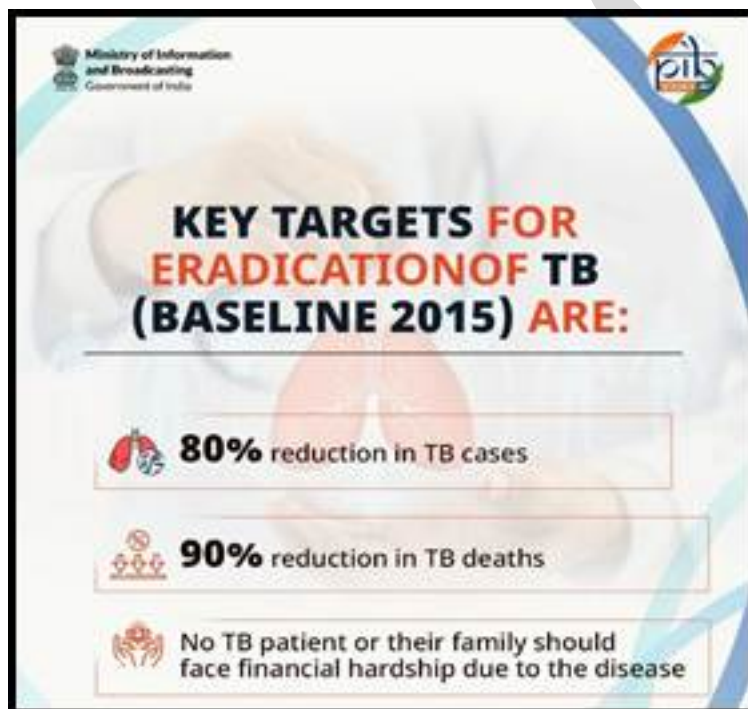


## **India's 100-Day TB Elimination Campaign**

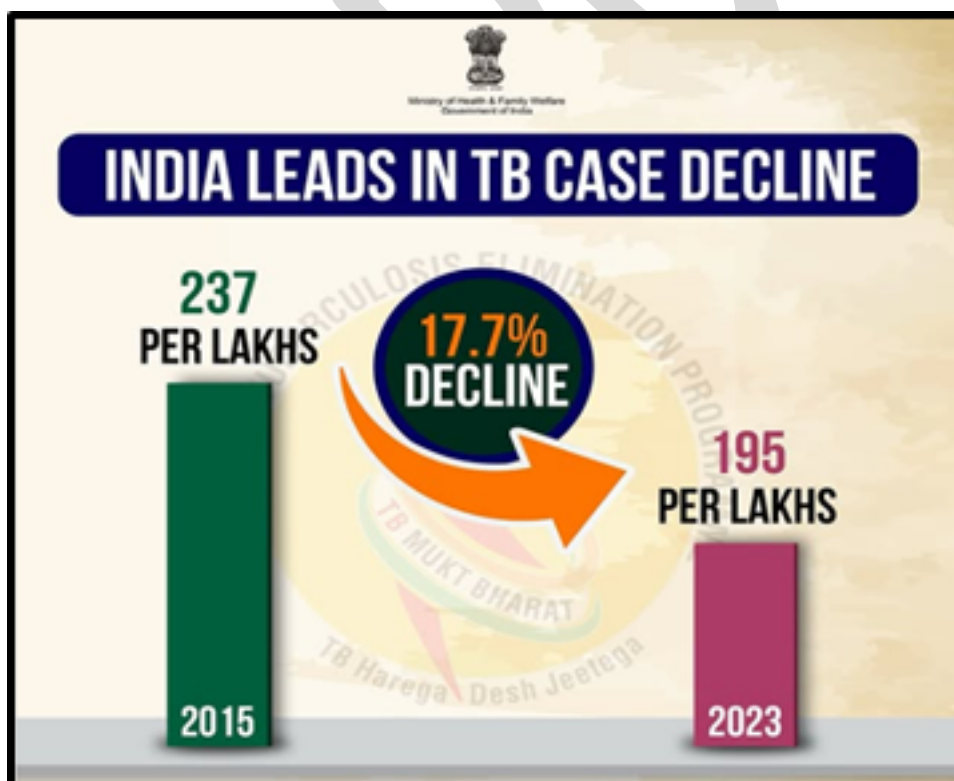
- Launched by Ministry of Health and Family Welfare @ Dec, 2024
- This campaign aims to accelerate the fight against TB by improving case detection, reducing diagnostic delays, and enhancing treatment outcomes, particularly for vulnerable populations.
- Objective :- Eliminate TB and a TB-free nation.

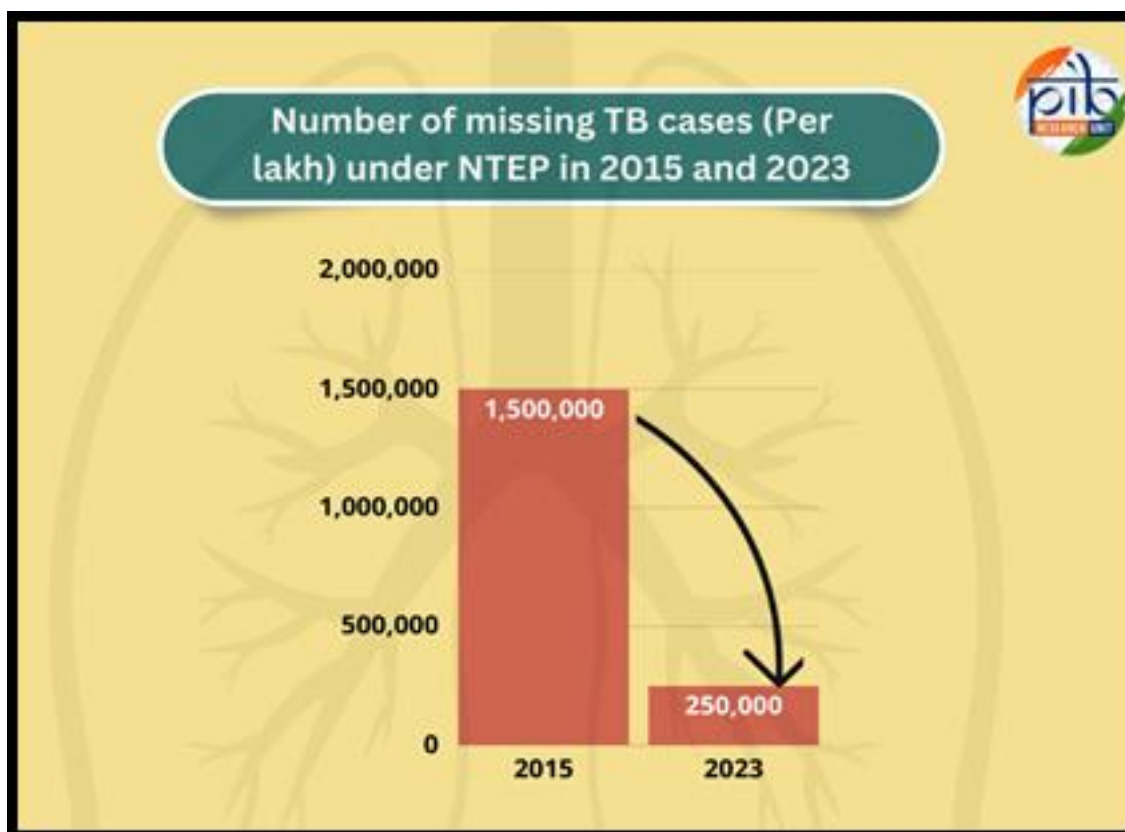
## **The National TB Elimination Programme (NTEP): A Vision for a TB-Free India**

- The 100-Day Campaign is a part of the broader framework of the National TB Elimination Programme (NTEP) under the aegis of the National Health Mission (NHM), which is aligned with the National Strategic Plan (NSP) for TB Elimination 2017–2025.
- The NSP focuses on reducing TB incidence, enhancing diagnostic and treatment capabilities, and addressing the socio-economic impact of the disease.
- This ambitious initiative reflects the vision set by Prime Minister Narendra Modi at the 2018 End TB Summit, where he pledged to achieve a **TB-free India by 2025. (UN's goal of ending TB by 2030).**

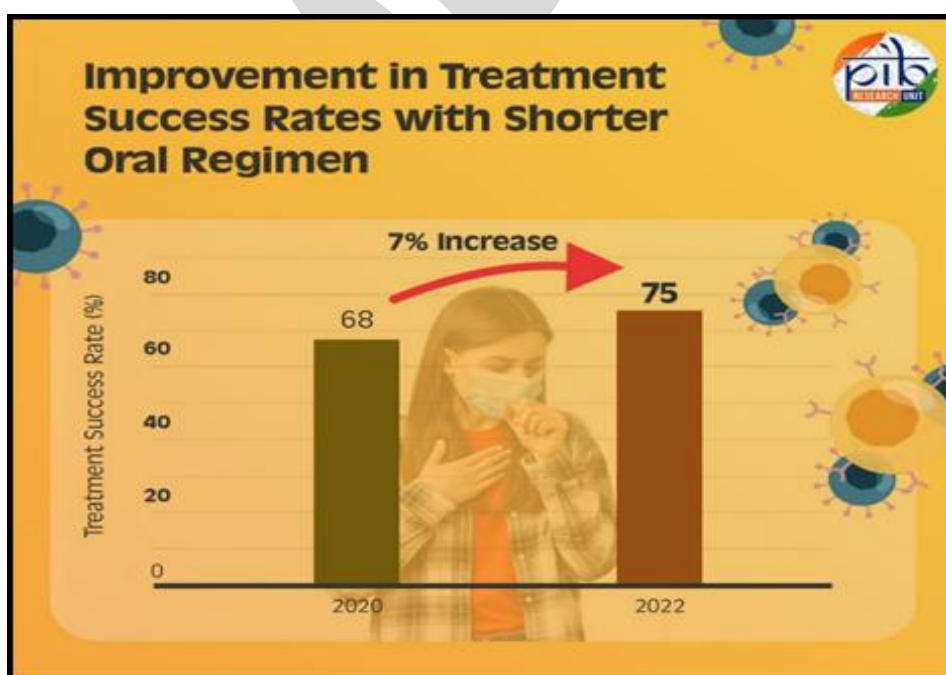








Under NTEP, India has rolled out improved drug-resistant TB treatments, including a safer, shorter **all-oral Bedaquiline regimen**, boosting success rates from 68% (2020) to 75% (2022). The **mBPAL regimen (Bedaquiline, Pretomanid, Linezolid)** offers 80% success for MDR-TB, cutting treatment to six months.



## **Pradhan Mantri TB Mukh Bharat Abhiyaan (PMTBMBA)**

- ⇒ One of the components of NTEP,
  - aims to unite communities, businesses, and institutions to support TB patients and their families.
- ⇒ It focuses on providing **nutritional, diagnostic, and vocational support** to improve treatment outcomes, reduce illness and deaths, and fast-track India's goal of TB elimination.
- ⇒ PMTBMBA is also recognized as the **world's largest crowd-sourcing initiative for nutritional support to TB patients.**

### **Key goals include:**

- Offering **additional care and support** to TB-affected individuals.
- Promoting **active community participation.**
- Mobilizing **CSR contributions** from businesses and institutions.

## **Ni-kshay Poshan Yojana (NPY)**

### Key Initiatives under Ni-Kshay Poshan Yojana



- Nutrition support for TB patients doubled from Rs. 500 to Rs 1,000 per month under Ni-Kshay Poshan Yojana
- TB patients receive ₹3,000 to ₹6,000 nutrition support during treatment
- 12 lakh underweight TB patients (BMI < 18.5) to receive Energy Dense Nutritional Supplements.
- Ni-Kshay Mitra initiative expanded to provide food baskets to patients' families.
- ₹3,202 crores disbursed to 1.13 crore beneficiaries via DBT. ₹1,040 crores additional funding approved (Centre-State 60:40 split)





- ⇒ **Ni-kshay Portal** is a web-based patient management and surveillance system under the **National Tuberculosis Elimination Programme (NTEP)**.
- ⇒ Developed by the **Central TB Division, MoHFW**, in collaboration with **NIC and WHO India**, it helps health workers in *both public and private sectors* to register TB cases, order tests, record treatment, monitor adherence, and transfer cases.
- ⇒ It also serves as India's **National TB Surveillance System**, ensuring real-time data reporting to the government.



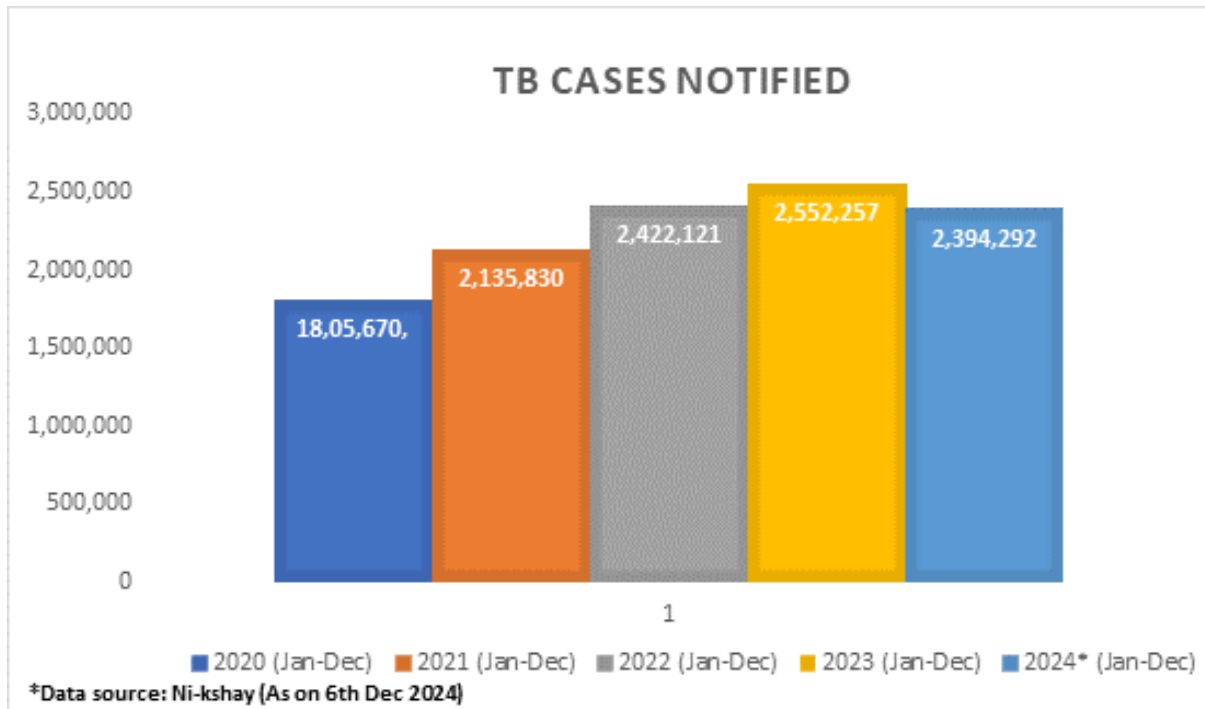
### Strategic Interventions

- **Targeted Interventions:** Focused strategies in high TB burden areas through State and District Specific Plans.
- **Free Drugs and Diagnostics:** Provision of free medications and diagnostic services for TB patients.
- **Active Case Finding:** Conducting campaigns to identify TB cases in vulnerable and co-morbid populations.
- **Integration with Ayushman Arogya Mandir:** Incorporating TB screening and treatment services within the Ayushman Arogya Mandir network.
- **Private Sector Engagement:** Offering incentives to the private sector for the notification and management of TB cases.
- **Expansion of Molecular Diagnostics:** Increasing the availability of molecular diagnostic laboratories at the sub-district level.
- **Ni-kshay Poshan Yojana:** Expanding coverage for nutritional support to TB patients under this initiative.
- **IEC Interventions:** Intensifying Information, Education, and Communication efforts to reduce stigma, raise community awareness, and improve health-seeking behaviors.
- **Collaboration Across Ministries:** Coordinating efforts and resources from various line ministries to support TB elimination.
- **TB Preventive Treatment (TPT):** Providing TB preventive treatment to contacts of TB patients and vulnerable populations.
- **Tracking through Ni-kshay Portal:** Monitoring notified TB cases using the Ni-kshay portal.
- **Support through Ni-kshya Mitra Initiative:** Offering additional nutritional, diagnostic, and vocational support to TB patients and their household contacts.

## Conclusion

- ⇒ India is making steady progress in its goal to eliminate TB by 2025 through focused interventions under the National TB Elimination Programme (NTEP).
- ⇒ Key initiatives like the Pradhan Mantri TB Mukh Bharat Abhiyaan (PMTBMBA) and Ni-kshay Poshan Yojana (NPY) are driving community participation and ensuring nutritional support, improving treatment adherence. The Ni-kshay Portal further

strengthens surveillance and patient care. To sustain momentum, increased investments, innovation, and partnerships are crucial. With continued commitment, India is poised to become a global example in the fight against TB.



## **Vikramshila University : Another Glory of India**

- ▽ Was famous for the practice of **Tantrayana (Vajrayana)**,
  - the last of the three great vehicles of Indian Buddhism after Hinayana and Mahayana.
  - Tantrayana, which incorporated tantric practices and rituals, is what the scholars at **Vikramshila excelled in.**
- ▽ **Founded by King Dharmapala of the Pala dynasty** in the late 8<sup>th</sup> to early 9<sup>th</sup> Century AD,
  - Vikramshila Mahavihar existed and flourished at the time of Nalanda.
- ▽ “While **Nalanda university** flourished from the Gupta Period (320-550 AD) @ **Kumargupta I** to the 12<sup>th</sup> Century,
  - Vikramshila thrived during the Pala Period (8<sup>th</sup> to 12<sup>th</sup> century).



↔ While Nalanda got more international fame for teaching varied disciplines, **Vikramshila was the only university that specialised in tantric and occult studies.**

- ▽ **While Nalanda is the older of the two universities**, at one point, the two centres of learning, which had a common patron in king Dharmapala, exchanged knowledge and even teachers, who were called Acharyas.
- ▽ At its peak, subject such as theology, philosophy, grammar, metaphysics and logic were taught a Vikramshila.
  - But the most important branch of learning were the tantras because Vikramshila flourished in the days of tantricism, when occult sciences and magic were subjects of study both in Buddhism as well as Hinduism.
- ▽ A **decline** that experts attribute to a combination of factors, from the **rising of Hinduism and the decline of Buddhism to the invasion of Bakhtiyar Khalji**, a general of the Turkish ruler Qutbuddin Aibak.
- ▽ It was in the library, the ruins of which are at the south-west of the site, that teachers and students are known to have engaged in copying and translating manuscripts.

### Quick Look:-

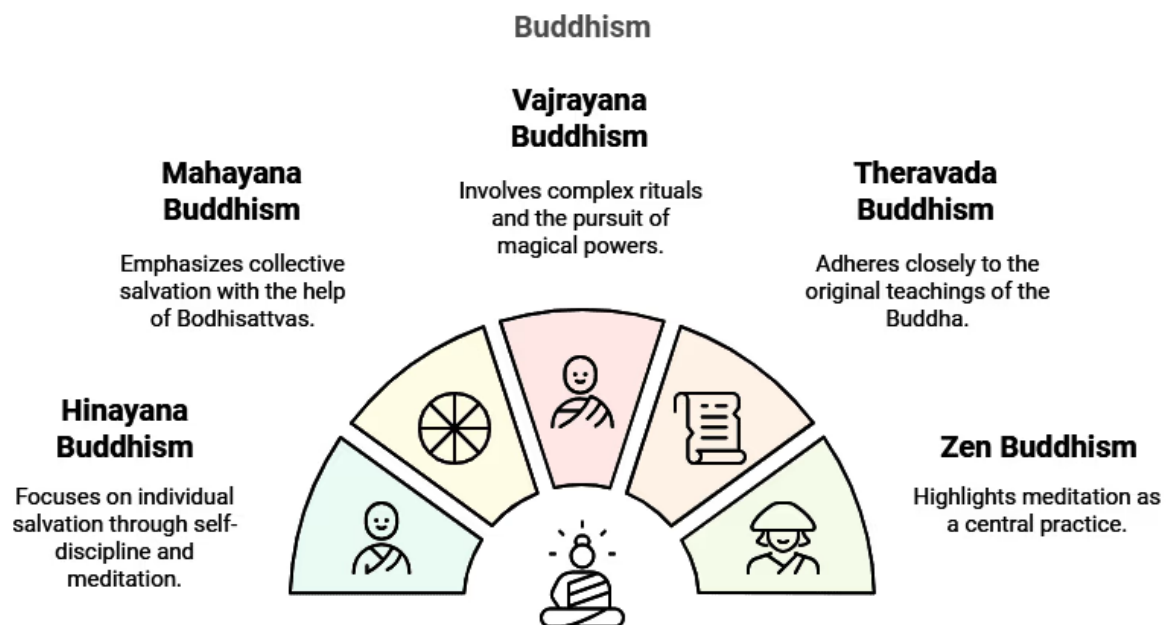
#### Nalanda Mahavihara

- Nalanda University was established by **Gupta Emperor Kumaragupta (Shakraditya)** in 427 CE during the early 5th century in modern Bihar.
- **It thrived for 600 years until the 12th century.**
- It gained popularity during the time of **Harshavardhana and the Palas monarchs.**
- Chinese scholar **Xuan Zang (Hiuen Tsang)** studied at Nalanda during **King Harshavardhana's** reign and took many scriptures back to China.
- **Around 670 AD, another Chinese pilgrim I-Tsing** visited Nalanda and noted that it had 2,000 students supported by money from 200 villages.
- The university attracted students from **China, Mongolia, Tibet, Korea, and other Asian countries.**
- Archaeological evidence suggests connections with the **Indonesian Shailendra dynasty.**
- Spiritual leaders like **Lord Buddha and Lord Mahavira meditated in the region**, contributing to its positive energy.
- Scholars like **Nagarjuna, Aryabhatta, and Dharmakirti** added to the scholarly traditions of ancient Nalanda.
- The university was destroyed in 1193 by **Bakhtiyar Khilji, a general of the Turkish ruler Qutbuddin Aibak.**

- It was rediscovered in 1812 by **Scottish surveyor Francis Buchanan-Hamilton** and later confirmed as the ancient university by **Sir Alexander Cunningham** in 1861.

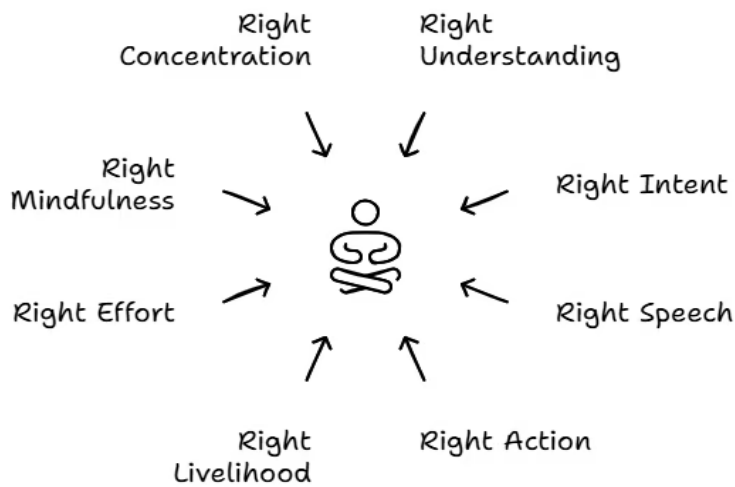
## **Vikramshila Mahavihara**

- Vikramshila University emerged as a leading hub for **Tantric Buddhism** and **Vajrayana Buddhism**, playing a pivotal role in the spread of these traditions.
- The university distinguished itself by specializing in **tantric and occult studies**, setting it apart from **Nalanda University**, which offered a broader curriculum.
- During **King Dharmapala's reign**, Vikramshila exerted influence over **Nalanda's affairs**, highlighting its administrative and academic dominance at the time.
- It drew over **1000 students** and **100 teachers** from across India and beyond, reflecting its international reputation as a center of learning.
- The institution produced renowned scholars like **Atisa Dipankara**, who significantly contributed to establishing **Buddhism in Tibet**.
- *Decline*: Vikramshila University met its end when it was destroyed by **Muhammad Bin Bakhtiyar Khalji** around 1203 AD, an event that also marked the downfall of Nalanda University.



↔ Hinayana should be dropped to refer to Buddhism existing today, and the term Theravada should be applied, also because the term Hinayana has a negative connotation.

## Path to Enlightenment



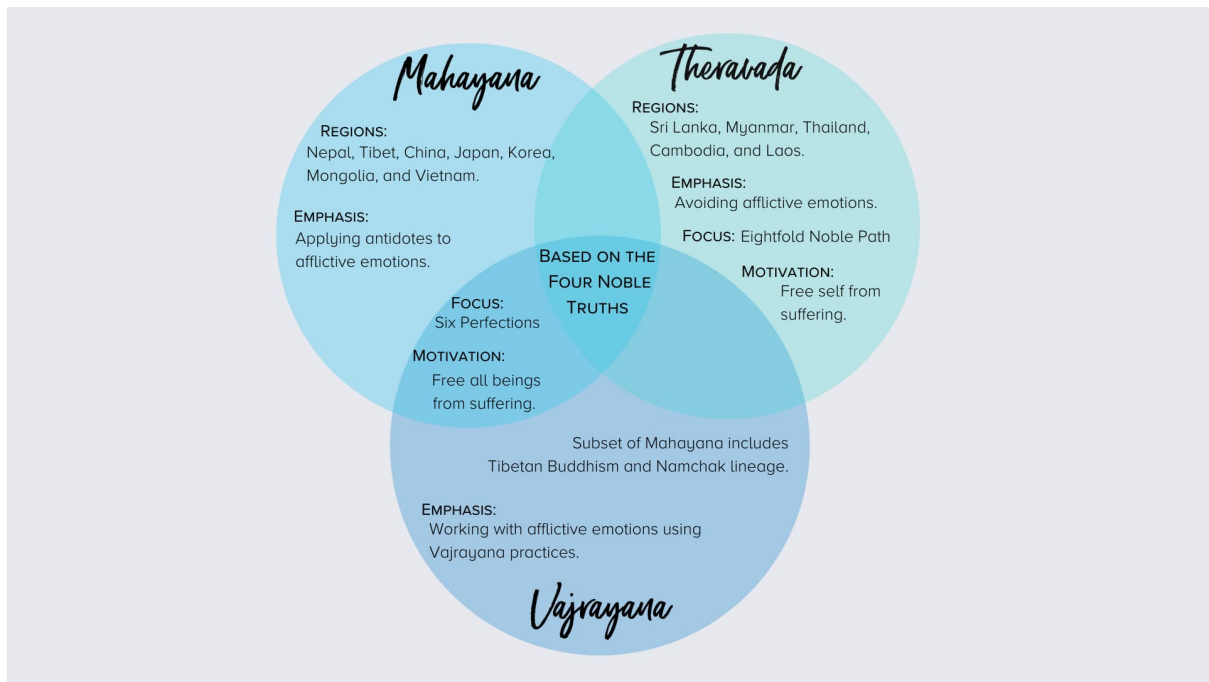
## Mahayana

- ⇒ **Region:** Mostly spread to Nepal, Tibet, China, Japan, Korea, Mongolia, and Vietnam.
- ⇒ **Emphasis:** Applying antidotes to afflictive emotions or poisons.
- ⇒ **Focus:** Six Perfections
- ⇒ **Motivation:** Motivation is to free all beings from suffering. Bodhicitta or the mind of enlightenment is the primary cause of enlightenment in the Mahayana. It is the wish to attain enlightenment in order to free all beings from suffering. So, no matter what practices you may engage in, if you do them with the motivation of bodhicitta, you are practicing a Mahayana path.

The Mahayana tradition accepts the validity of all the Theravada teachings such as the Eightfold Noble Path but considers that those teachings were taught to a certain group of disciples in a certain place and time. At other times, the Buddha taught the Mahayana path with its own particular aspects and emphasis which are the ones which they take as being of primary importance.

## Vajrayana

- ⇒ Subset of Mahayana that includes Tibetan Buddhism and Namchak lineage.  
**Emphasis:** Working with afflictive emotions using Vajrayana practices to get past the poisonous aspect to the pure aspect of each emotion.
- ⇒ **Focus:** Six Perfections
- ⇒ **Motivation:** Free all beings from suffering.

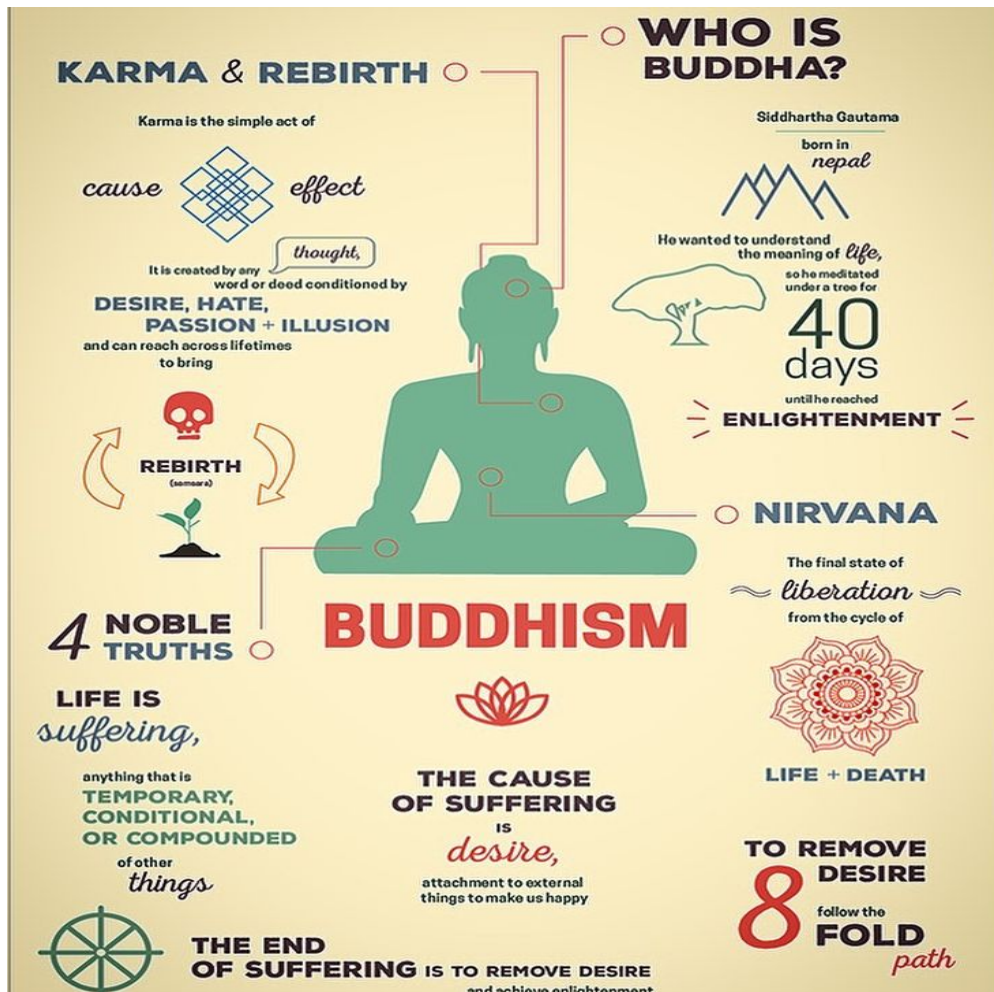


## Theravada

- ⇒ **Region:** Mainly spread in Sri Lanka, Myanmar, Thailand, Cambodia, and Laos.
- ⇒ **Emphasis:** Avoiding afflictive emotions or poisons and monasticism.
- ⇒ **Focus:** Eightfold Noble Path
- ⇒ **Motivation:** To free oneself from suffering. It's not as if there are no teachings on love and compassion for others in the Theravada tradition, but the difference lies in the motivation for practicing.

Below are three simple ways to remember the Three Divisions of Buddhism:

- **Theravada**, or School of the Ancient Ones, takes the first approach mentioned above—**avoiding the poison**.
- **Mahayana buddhism**, or Great Vehicle, follows the second approach—**taking an antidote**.
- **Vajrayana buddhism**, or Diamond Vehicle, is actually a subcategory of Mahayana buddhism, and it takes the third—**distilling the poison to its pure essence**. Vajrayana meets us where we're at, with all our afflictive emotions, and leads us to our Buddha Nature. It uses the impure parts and helps us to smelt them like gold, to come to the pure essence.



**28.03.2025**

## **How 'preparation' for rape differs from 'attempt' to commit the crime**

It is a crucial distinction, as 'preparation' is not punishable in the vast majority of cases, while an 'attempt' to commit an offence is criminally punishable.

- ▽ The Supreme Court on Wednesday (March 26) stayed a ruling of the Allahabad High Court that said grabbing the breasts of a minor child and breaking the string of her pyjama "hardly constitute[d] an offence of attempt to rape", and merely amount[ed] to "preparation".
- ▽ A Bench of Justices B R Gavai and A G Masih said "some of the observations made in the impugned order...depict a total lack of sensitivity on the part of the author of the judgment".
- ▽ In his order passed on March 17, Justice Ram Manohar Narayan Mishra of the Allahabad High Court deleted the charges of attempted rape against three accused persons and



*directed that they should be tried for the “minor offence” of assaulting or using criminal force against a woman under Section 354B of the Indian Penal Code, 1860 (IPC). read with Sections 9/10 (aggravated sexual assault) of the Protection of Children from Sexual Offences Act, 2012 (POCSO Act).*

## **“Preparation” vs “Attempt”**

▽ **To prove** an **attempt to commit** an offence,

→ certain other things **must be proven**, including that the **accused made preparations to commit the offence**, the Supreme Court has held earlier.

In essence, **preparing to commit an offence is a stage that precedes the attempt to commit that offence.**

▽ In **Abhaynand Mishra v. State of Bihar (1961)**, the SC ruled that to prove an attempt to commit an offence, the prosecution must broadly show that:

- The accused had the **“intention” to commit** that offence.
- The accused **made preparations to commit** the offence.
- The accused **then acted towards committing the offence** — **this need not be the “penultimate act”**, that is, the final act before the offence is committed.
- The penultimate act took place **“during the course of committing that offence”**. **(This is known as the requirement of “proximity”.)**

▽ Crucially, an attempt is said to be made **only when this penultimate act takes place** —

↓  
an accused cannot be held guilty for merely making preparations

↓  
without taking any action towards committing a crime.

▽ As the SC put it in **State of Maharashtra v Mohd. Yakub (1980)**, **“attempt begins where preparation ends”**.

## **Standard applied by HC**

### **Facts of the case :-**

▽ The facts of the case, as recorded in the judgment, are as follows:

- The accused persons met the minor girl and her mother and offered to drop the child home on their motorcycle.

- On the way, “they started grabbing her breasts and...dragged her and tried to take her beneath the culvert and broke the string of her pyjama”.
- Two witnesses who heard the cries of the child arrived on the scene before the offence of rape could take place.
- The accused persons made some threats and fled.
- They were charged with attempt to commit rape under the IPC and POCSO Act.

### **HC’s observation:-**

- ▽ The HC held that the “the allegations...and facts of the case hardly constitute an offence of attempt to rape... The prosecution must establish that it had gone beyond the stage of preparation”.
- ▽ The HC also relied on an old English case, **Rex v. James Lloyd (1836)**, in which the judge, Justice Patterson, held: “In order to find the prisoner guilty of an assault with intent to commit a rape, you must be satisfied that the prisoner.....not only desired to gratify his passions upon her person but that he intended to do so at all events and notwithstanding any resistance on her part.”
  - The English judge noted that “indecent assaults are often magnified into attempts at rape, and even more often into rape itself”, and the court must be satisfied that the accused showed “**a determination to gratify his passions...in spite of all resistance**”.
  - This high bar essentially requires the victim to offer “**resistance**” for the accused to be charged with an attempt to rape.
- ▽ The HC judgment also found that “There is no allegation that accused tried to commit penetrative sexual assault against the victim”.
  - Penetration is a precondition for proving rape under the IPC.

S.63(d), BNS :- “**applies his mouth to the vagina, anus, urethra of a woman** or makes her to do so with him or any other person, under the circumstances falling .....” **[that means the BNS has remedied this penetration issue.]**
- ▽ Therefore, the court held that the accused cannot be summoned for the offence of attempted rape — and they are only liable to be summoned “for minor charge of Section 354(b) IPC i.e. assault or abuse a woman with intent to disrobing or compelling her to be naked”, which carries a punishment of 1-5 years’ imprisonment.

### **Earlier instances**

- ▽ The almost two-centuries-old Lloyd ruling continues to act as a basis for deciding if an accused attempted to commit the offence of rape.
- ▽ In May 2024, the Rajasthan HC applied the standard test for ‘attempt’ as well as the Lloyd ruling to alter an attempted rape conviction and instead hold the accused guilty under Section 354, thus reducing the punishment.
- ▽ In 2004, the Supreme Court had adopted a similar approach to achieve the same result in the case of Aman Kumar & Anr v. State of Haryana.

- The Supreme Court, which took suo motu cognizance of the HC verdict on March 25, now has the opportunity to reconsider the legal standard for attempted rape. While issuing a stay on the ruling, the court noted that the Allahabad HC's observations "are totally unknown to the tenets of law and depict total insensitivity and inhuman approach".

| No. | Preparation                                                                                                                                                                       | Attempt                                                                                                                  |
|-----|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------|
| 1   | <i>Preparation is an executory Act, it comes before an attempt.</i>                                                                                                               | <i>Attempt is an Executed Act. Attempt is direct movement towards the Commission after the Preparation is made</i>       |
| 2   | <b>Example:</b> A purchases Knife to murder B. Mere purchase of Knife which is a preparation.                                                                                     | <b>Example:</b> A purchases poison and mixes it in the meal of his wife with intention to kill her . It is an attempt.   |
| 3   | <b>Stage:</b> Preparation is an Act of arranging all the necessary means or articles or commodities to do an illegal act.                                                         | <b>Stage:</b> Attempt is an act done as per the planning which amounts to offence in all cases.                          |
| 4   | <b>Knowledge:</b> Only the person who intends to commit the crime knows fact.                                                                                                     | <b>Knowledge :</b> Once the attempt is complete it manifests                                                             |
| 5   | <i>Attempt would not be an offence if a person Voluntarily gives up the idea of committing the crime. In this stage it is mere chance of commission of crime</i>                  | <i>It amounts to an offence... i.e. to attempt to do an illegal act.</i>                                                 |
| 6   | <b>Punishment :</b> Preparation is punishable in few cases such as Preparation to commit dacoity under Section 399 of Indian Penal Code.( S.399 - Making preparation to dacoity ) | <b>Punishment :</b> According Section 511 of IPC Attempt is punishable with imprisonment for life or other imprisonment. |

**30.03.2025**

## **Second Gold Scheme comes to an end**

### **What RBI says about existing deposits under Gold Monetisation Scheme**

▽ After **sovereign gold bonds** [Feb 01, 2025 @ Budget],

the Centre has drawn the curtains on another gold-related scheme – (**GMS**) – ***amid a spike in gold prices.***

- The Ministry of Finance in a release issued on Tuesday said that it will discontinue medium and long-term deposits under the Gold Monetisation Scheme from March 26.
- The Ministry cited **evolving market conditions and performance of the scheme** while announcing the discontinuation.
  - However, short-term bank deposits, which are under the ambit of banks in the scheme, will continue at the discretion of individual banks based on the commercial viability as assessed by them, it said.

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#### **Quick Note:-**

Short-term bank deposit (1-3years)      Continuing  
(Individual bank's discretion)

Medium-term government deposit (5-7 years)      Discontinued  
Long-term government deposit (12-15)

However, the existing deposits will continue till redemption.

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#### **What was the scheme about?**

▽ The Gold Monetisation Scheme was **launched** in November **2015** to make idle gold productive.

- It let consumers to **either sell** their gold **or store** it with banks, so it

↓

could **merge into the formal economy** and **reduce** the country's **gold imports**  
and thus, **reduce** the **current account deficit**.

- Idle gold held by **households, trusts and various institutions in India** was deposited under this scheme.
- GMS was a **revamped version of an older Gold Deposit Scheme**.

▽ It consisted of three components:

- **Short-term bank deposit (1-3 years)**
- **Medium-term government deposit (5-7 years)**
- **Long-term government deposit (12-15)**

▽ The **minimum deposit allowed was 10 gm of raw gold** (*bars, coins, jewellery excluding stones and other metals*).

→ There was **no maximum limit for deposit** under the scheme.

### **Interest rate offered**

▽ The amount of interest rate payable for **short-term deposits** under the Gold Monetisation Schemes

is **decided by the banks** on the basis of

the prevailing international lease rates,  
other costs,  
market conditions, etc, and

is **borne by the banks**.

▽ For **medium and long-term deposits**,

the rate of interest was **decided by the government**, **in consultation with the RBI** and

**borne by the Central government.**

→ Gold Monetisation Scheme **interest rate was fixed**

- at **2.25** per cent for **medium-term bonds** and
- at **2.5** per cent for the *long-term bonds*.

### **What is the status of other gold scheme?**

- GMS is the second gold scheme to face closure by the government in recent months amid a sharp surge in gold prices.
- The Centre had earlier discontinued fresh issuance of sovereign gold bonds.

⇒ Gold prices have risen sharply by Rs 26,530 or 41.5 per cent



to **Rs 90,450 per 10 gm** (as of March 25, 2025)  
from Rs 63,920 per 10 gm on January 1, 2024.

(41.5% spike in 1 year 3 months)

## DETAILS OF GOLD MOBILISED UNDER GMS

| Deposit Types                       | Gold Deposited* |
|-------------------------------------|-----------------|
| Cumulative quantity of gold (in Kg) | 31,164          |
| a. Short-term gold deposit          | 7,509           |
| b. Medium-term gold deposit         | 9,728           |
| c. Long-term gold deposit           | 1,3926          |
| Number of participating banks       | 10              |
| Number of depositors                | 5,693           |

\*Gold in kg as on November 30, 2024

Source: Ministry of Finance

## Gold deposit – highest to lowest

1. Long term
2. Medium term
3. Short term

## Quick Look:-

### What is a Sovereign bond?

- A Sovereign bond is a government debt security sold by a national government to finance itself.
- These bonds are regarded as low-risk because the creditworthiness of the issuing nation supports them.
- The **Sovereign Gold Bond Scheme (SGB)** was introduced by the Government in November 2015 under the Gold Monetisation Scheme. (Got discontinued Feb 01, 2025 [Budget]....check March, 2025 CA update)
  - Under the scheme, issues are made available for subscription in tranches by RBI with prior consultation with the GOI.
  - RBI Notifies terms and conditions for the scheme from time to time.

- Subscriptions for SGB will be open according to the following calendar.
- The price of SGB will be announced by RBI prior to each new tranche by releasing a Press Release.

### Schemes Linked with Sovereign Bonds

- **Sovereign Gold Bonds (SGBs):** These bonds allow investors to be issued by the Government of India, which will enable investors to invest in gold without possessing physical gold.
- **Government Securities (G-Secs):** The Reserve Bank of India (RBI) issues long-term bonds on behalf of the government.
- **Treasury Bonds (T-Bonds):** Governments globally issue long-term sovereign bonds, e.g., U.S. Treasury Bonds.
- **Green Bonds:** To raise funds for environmentally friendly projects.

### Advantages of Sovereign Bonds

- **Low Risk:** Since it is backed by the government, default risk is reduced.
- **Fixed Returns:** Provides certain interest payments.
- **Liquidity:** It can be traded in secondary markets.
- **Tax Benefits:** Some sovereign bonds are tax-free.
- **Hedge Against Inflation:** Certain bonds, such as inflation-indexed bonds, protect against inflation.

### Key takeaways

- ~ Sovereign bonds are government debt securities issued by the government and are low risk, as the government backs them.
- ~ The most sought-after schemes are Sovereign Gold Bonds (SGBs), Government Securities (G-Secs), Treasury Bonds, and Green Bonds.
- They provide

fixed income,  
liquidity,  
tax advantages, and  
inflation hedging.

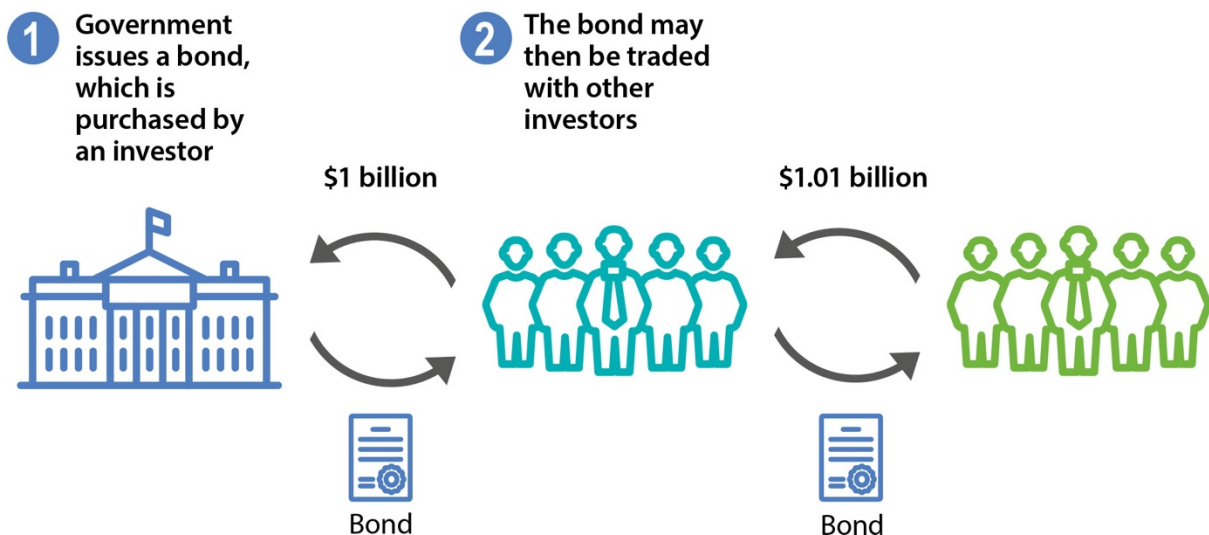
- They are instrumental in raising funds for the government while offering an assured investment vehicle to investor

## Bonds

### What is a bond?

- A bond is a loan made by an investor to a borrower for a set period of time in return for regular interest payments.
  - The time from when the bond is issued to when the borrower has agreed to pay the loan back is called its 'term to maturity'.
  - There are government bonds (where a government is the borrower) and corporate bonds (where a business or a bank is the borrower).
- **The main difference between a bond and a regular loan is that, once issued, a bond can be traded with other investors in a financial market. As a result, a bond has a market price.**
  - For example, in the diagram below the Government has issued a bond to the value of \$1 billion, which was purchased by an investor. The bond may then be traded with other investors in financial markets, at which point its market price can change (in this instance, it has become \$1.01 billion).

#### Illustrative Example of a Government Bond



## What is a bond yield?

- A bond's yield is the return an investor expects to receive each year over its term to maturity.
  - For the investor who has purchased the bond, the bond yield is a summary of the overall return that accounts for the remaining interest payments and principal they will receive, relative to the price of the bond.
  - For an issuer of a bond, the bond yield reflects the annual cost of borrowing by issuing a new bond.
- For example, if the yield on three-year Australian government bonds is 0.25 per cent, this means that it would cost the Australian government 0.25 per cent each year for the next three years to borrow in the bond market by issuing a new three-year bond.
- **When a bond is issued**, an investor has purchased the bond for the **first time** in a marketplace called the **'primary market'**.
  - The initial price the investor pays for the bond depends on a number of factors, including the size of the interest payments promised, the term of the bond and the price of similar bonds already issued into the market.
  - This information (including the price paid) is used to calculate the initial yield on the bond.
  - **Once a bond is issued**, the investor is **then able to trade that bond with other investors** in the **'secondary market'** *and its price and yield may change with market conditions.*

### Quick Understanding here:-

- Bond has been issued on **two stages**:-
  - 1<sup>st</sup> ) Between one seller and another investor
    - This first issued bond is belonged to **Primary Market**
  - 2<sup>nd</sup> ) Then the first investor → trades this very bond with other investors
    - This second issued bond is belonged to **Secondary Market**

# What is the relationship between the price of a bond and its yield?

- The prices at which investors buy and sell bonds in the secondary market move in the opposite direction to the yields they expect to receive (see Box below on 'Bond Prices and Yields – An Example').
  - Once a bond is issued, it offers fixed interest payments to its owner over its term to maturity, which does not change.
  - However, interest rates in financial markets change all the time and, as a result, new bonds that are issued will offer different interest payments to investors than existing bonds.
- For example, suppose interest rates fall.
  - New bonds that are issued will now offer lower interest payments.
    - This makes existing bonds that were issued before the fall in interest rates more valuable to investors, because they offer higher interest payments compared to new bonds.
    - As a result, the price of existing bonds will increase.
  - However, if a bond's price increases it is now more expensive for a potential new investor to buy.
    - The bond's yield will then fall because the return an investor expects from purchasing this bond is now lower.

## Bond Prices and Yields



### Quick Understanding here:-

- 1) If bond prices increase → Bond yields will slash
- 2) If bond prices decrease → Bond yields will spike

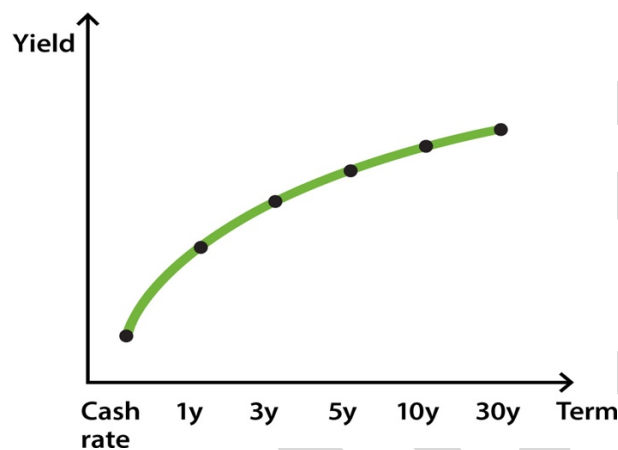
- Bond prices vary because of changes in the market interest rate



# The Yield Curve

## What is the yield curve?

- The yield curve – also called **the term structure of interest rates** – shows the yield on bonds over different terms to maturity.
  - The 'yield curve' is often used as a shorthand expression for the yield curve for government bonds.
- **The yield curve for government bonds** is also called the **'risk free yield curve'**.
  - The expression 'risk free' is used because governments are not expected to fail to pay back the borrowing they have done by issuing bonds in their own currency.

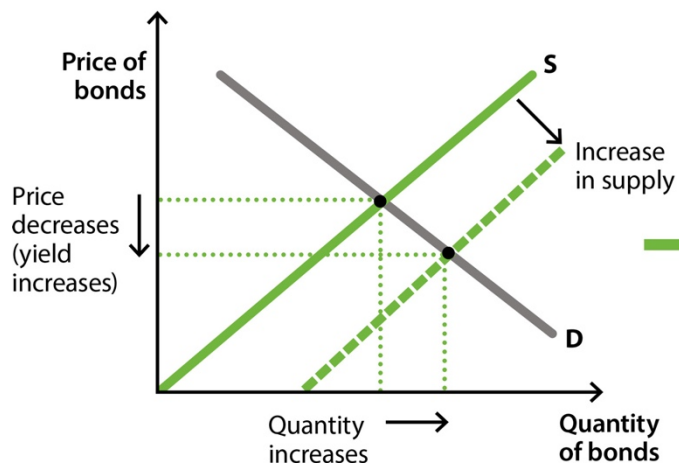


- **Other issuers of bonds, such as corporations**, generally issue bonds at a **higher yield** than the government, as they are **more risky** for an investor.
  - This is because the loan or interest payments in the bond may not be paid by the corporation to its owner at the agreed time. When this occurs, it is called a 'default'.

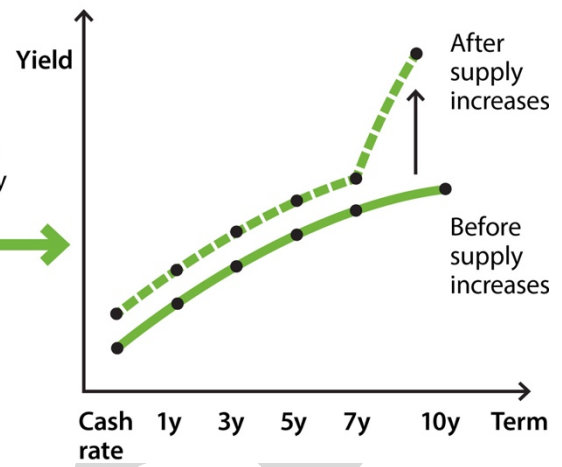
## Why is the Yield Curve Important?

- The yield curve receives a lot of attention from those who analyse the economy and financial markets. The yield curve is an important economic indicator because it is:
  - central to the transmission of monetary policy
  - a source of information about investors' expectations for future interest rates, economic growth and inflation
  - a determinant of the profitability of banks.

Ten Year Bond Market



The Yield Curve



04.04.2025

SHOCK THERAPY SENDS U.S. MARKETS PLUNGING: DOW DOWN 3.4%, NASDAQ CRASHES 5.8%, OIL SLIDES 6%

# Trump Tariffs the World

## How tariffs will hit, whom

Several countries with low per capita incomes have been hit by the highest levels of tariffs. Tariffs will have significant economic consequences for US and rest of the world – high inflation, slower growth, or worse

### MAKING AMERICA WEALTHY AGAIN: AT WHOSE COST?

| Country      | Tariffs on US goods (US estimates) | Trump's 'reciprocal' tariffs | US trade deficit in 2024 (\$mn) | US trade deficit as % of total* | Per capita income(US: \$ 89,680) |
|--------------|------------------------------------|------------------------------|---------------------------------|---------------------------------|----------------------------------|
| Cambodia     | 97%                                | 49%                          | - 12,300                        | 1.0                             | \$ 2,950                         |
| Vietnam      | 90%                                | 46%                          | - 1,22,071                      | 10.1                            | \$ 4,990                         |
| Sri Lanka    | 88%                                | 44%                          | NA                              | NA                              | NA                               |
| Bangladesh   | 74%                                | 37%                          | - 6,152                         | 0.5                             | \$ 2,770                         |
| Thailand     | 72%                                | 36%                          | - 45,609                        | 3.8                             | \$ 7,750                         |
| China        | 67%                                | 34%                          | - 2,95,402                      | 24.6                            | \$ 13,870                        |
| Taiwan       | 64%                                | 32%                          | - 73,937                        | 6.1                             | \$ 34,920                        |
| Indonesia    | 64%                                | 32%                          | - 17,883                        | 1.5                             | \$ 5,250                         |
| Switzerland  | 61%                                | 31%                          | - 38,463                        | 3.2                             | \$ 1,11,720                      |
| South Africa | 60%                                | 30%                          | - 8,837                         | 0.7                             | \$ 6,520                         |
| Pakistan     | 58%                                | 29%                          | - 2,989                         | 0.2                             | NA                               |
| India        | 52%                                | 26%                          | - 45,664                        | 3.8                             | \$ 2,940                         |
| South Korea  | 50%                                | 25%                          | - 66,007                        | 5.5                             | \$ 37,670                        |
| Japan        | 46%                                | 24%                          | - 68,468                        | 5.7                             | \$ 35,610                        |
| Malaysia     | 47%                                | 24%                          | - 24,830                        | 2.1                             | \$ 14,420                        |
| EU           | 39%                                | 20%                          | - 2,31,769                      | 19.3                            | \$ 45,240                        |
| Israel       | 33%                                | 17%                          | - 7,425                         | 0.6                             | \$ 54,370                        |
| Philippines  | 34%                                | 17%                          | - 4,880                         | 0.4                             | \$ 4,440                         |
| UK           | 10%                                | 10%                          | 11,857                          | - 1.0                           | \$ 54,280                        |
| Brazil       | 10%                                | 10%                          | 7,351                           | - 0.6                           | \$ 10,820                        |
| Singapore    | 10%                                | 10%                          | 2,829                           | - 0.2                           | \$ 93,960                        |
| Chile        | 10%                                | 10%                          | NA                              | NA                              | \$ 17,930                        |
| Australia    | 10%                                | 10%                          | - 73,927                        | 6.1                             | \$ 67,980                        |
| Turkey       | 10%                                | 10%                          | - 1,453                         | 0.1                             | \$ 16,880                        |
| Colombia     | 10%                                | 10%                          | 1,347                           | - 0.1                           | \$ 7,900                         |
| WORLD        |                                    |                              | - 12,02,872                     |                                 | \$ 14,450                        |

\*Total US trade deficit. Source: White House, IMF, The Indian Express Research

### Quick Look:- Liberation Day

- In the White House Rose Garden address on April 2, 2025, Trump declared that April 2 was "Liberation Day," describing the

announcement as "one of the most important days in American history" and "our declaration of economic independence."

- The president unveiled a two-tier tariff structure:

|                                                                                                                             |                                                                                                                                                                |
|-----------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------|
| a baseline <b>10%</b> tariff applied universally to imports from all countries with the exception of Canada and Mexico, and | additional country-specific <b>"reciprocal"</b> tariffs based on what the administration deemed unfair trade practices by approximately 60 individual nations. |
| The 10% baseline tariff will take effect on April 5, 2025                                                                   | the higher country-specific rates will take effect on April 9, 2025                                                                                            |

### What's Driving "Liberation Day": Reckoning or Revenue Play?

The rationale behind "Liberation Day" follows a two-part story.

⇒ The first is the administration's own framing, that this is a necessary corrective to decades of open U.S. markets being met with asymmetrical foreign tariffs and other barriers that boxed out U.S. goods.

- Only aggressive retaliation can reverse the damage and pull manufacturing back onshore.

⇒ The second is more transactional: that tariffs are ultimately **a revenue-raising mechanism** to help finance the **sweeping tax cuts** the administration hopes **to announce before year's end.**

□ They can both be true. One supplies the story. The other pays the bill.

□ But there is also a tension: **the higher the tariffs, the lower the remaining trade and thus revenue.**

#### Summary understanding

**The Public Story:** Retaliate, Reclaim, Reindustrialize  
**The Quiet Story:** Raise Money Now, Cut Taxes Later

## What is Independence Day for USA?

- The Fourth of July celebrates the passage of the Declaration of Independence by the Continental Congress on July 4, 1776.
  - The Declaration announced **the political separation of the 13 North American colonies from Great Britain.**
  - Founding Father and First President – George Washington (1789-1797)

## **HOW SMOOT-HAWLEY TARIFF ACT (1930) DEEPENDED THE GREAT DEPRESSION**

- ▽ President Donald Trump's tariffs announcements have prompted a comparison with the great Depression-era Smoot-Hawley Tariff Act, which ended up worsening the crisis it intended to resolve.
- ▽ “With today’s announcement, US tariffs will approach levels not seen since the Smoot-Hawley Tariff Act of 1930, which incited a global trade war and deepened the Great Depression.”

### Smoot-Hawley Act

- ▽ In 1930, Congress passed a bill sponsored by Senator Reed Smoot of Utah and Rep. Willis Hawley of Oregon **to raise import duties on 20,000 goods to protect American farmers and businesses.**
  - **President Herbert Hoover signed this into law**, ignoring a petition signed by over 1,000 economists asking him to veto it.
- ▽ Hoover, a **Republican**, had emerged victorious in 1928, having campaigning on agricultural protectionism.

The tariff act was originally mooted to protect the American agricultural lobby, which thrived during World War I on the back of increased foreign demand, but now found itself battling debts and low commodity prices amid a glut of produce.

- ▽ **The stock market crash of 1929 served as an impetus for a wider range of tariffs.**
- ▽ The Act placed aggressive tariffs on roughly 25% of all imported goods to the US.

Protection of Agriculture  
Stock Market crash of 1929



## Catastrophic trade war

- ▽ The Act spurred a trade war.
  - Major trading partners, including Canada and Europe, retaliated with boycotts, quotas, and their own tariffs on American goods.
  - American exports to retaliating nations fell by 28-32%.
  - The Act jeopardised recovery efforts of countries trying to emerge from the impacts of WW I and the Great Depression.
- ▽ US imports from Europe declined from a 1929 high of \$1.3 billion to just \$390 million in 1932, (30%)
  - while US exports to Europe fell from \$2,341 million in 1929 to \$784 million in 1932. (around 34%)
- Overall, world trade declined by 66% between 1929 and 1934.

- ▽ In 1934, President Franklin D Roosevelt

signed the Reciprocal Trade agreements Act,

which transferred the authority for tariff policy from Congress to the White House.

This allowed the President to pursue bilateral trade agreements and quickly repeal the tariffs.

- ▽ Economist Douglas Irwin, author of Clashing over Commerce: A history of US Trade Policy (2017), told Bloomberg that Trump's tariffs would be "much bigger than Smoot-Hawley" due to the scale of today's trade, with US imports amounting to 14% of its GDP, three times the share in 1930.

## AMONG TARIFFED: ISLANDS WHERE ONLY PENGUINES, US MILITARY LIVE

- ▽ No Human is believed to have set foot on the Heard and McDonald Islands in nearly a decade.
- ▽ The volcanic islands are one of the seven external territories belonging to Australia, located roughly 4,100km to the south-west of Perth, and 1,600km to the north of the Atlantic coast.
  - Covered in glaciers, and barren for the most part,
  - the archipelago is among the most remote places on the planet,
  - home to only penguins, seals, and seabirds.

As the only volcanically active sub-antarctic islands they ‘open a window into the earth’, thus providing the opportunity to observe ongoing geomorphic processes and glacial dynamics.

The distinctive conservation value of Heard and McDonald – one of the world’s rare pristine island ecosystems – lies in the complete absence of alien plants and animals, as well as human impact.

### Not all that is baffling

- ▽ The Heard and McDonald Islands are not the only baffling entry on Trump’s list of “countries” on which the United States has imposed reciprocal tariffs.
  - In the list are *three other Australian external territories*:
    - **Cocos (Keeling) Islands,**
    - **Christmas Island, and**
    - **Norfolk Island.**
- ▽ Of note here is the case of **Norfolk Island**, which has been slapped with a **29% tariff** – 19 percentage points higher than the rest of Australia. Located roughly 1,600km to the north-east of Sydney, the Island has **around 2,000 permanent inhabitants**.



- ▽ Trump has also imposed a **10% tariff** on the **British Indian Ocean Territory (BIOT)**, which comprises the Chagos archipelago, a group of the **low-lying islands in the Indian Ocean, between the Maldives and Mauritius**.
  - The largest **Chagossian island, Diego Garcia**, is home to a **strategic joint US-UK military base**.
    - Home to approximately **4,000 American and British military personnel**, it is the only currently inhabited island in the BIOT.

- Chagos does not have any civilian inhabitants.



### Diego Gracia

- Diego Garcia is a coral atoll, the largest and southernmost member of the Chagos Archipelago, located in the central Indian Ocean, part of the **British Indian Ocean Territory (BIOT)**.
- It's situated in the **central Indian Ocean**, approximately 7 degrees south of the equator.
- Current Status:
  - In 1965, it became part of the newly formed BIOT, separated from Mauritius.
  - In 1966, the UK leased Diego Garcia to the US to create an air and naval base, leading to the forced removal of the island's inhabitants.

**05.04.2025**

**Which countries are quitting a key Landmine treaty and why?**

NATO members  
[Poland, Finland]  
and  
all three Baltic states  
[Estonia, Latvia and Lithuania]

have queued up over the past few weeks *to withdraw from the*

**Ottawa Convention** banning anti-personnel landmines,

in the face of what they say are **growing military threats from Russia.**

▽ The moves threaten to reverse decades of campaigning by activists who say

there should be a global ban on a weapon that blights huge swathes of territory and maims and kills civilians long after conflicts have abated.

### **Exiting countries**

▽ **All European countries bordering Russia have announced plans to quit the global treaty.**

- **Norway**, which said this week that for all the increased threats it was important to maintain the stigma around the weapons, **is the sole exception.**

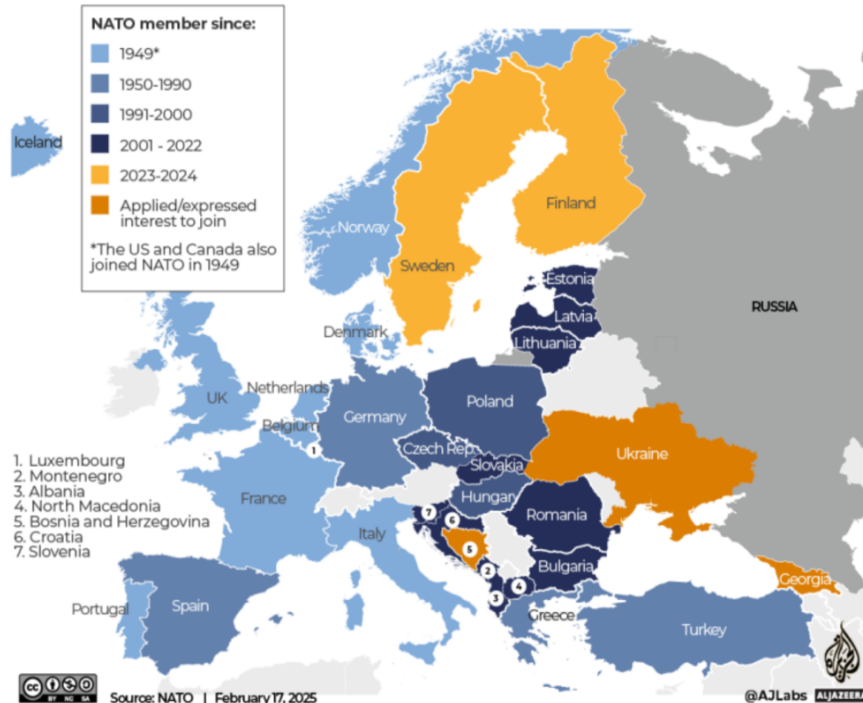
▽ Many have said they fear that, as United States President Donald Trump steps up pressure to end the war in Ukraine, Russia could use any pause to rearm and target them instead. **(post-Ukraine fear psychosis)**

▽ Officials have suggested a withdrawal could also put them on more of an equal footing with Russia which – along with the likes of the US, China, India and Israel – has not signed or ratified the treaty. **(Equibalance with the Majors)**

## Quick Look :-

### NATO's European expansion

NATO was founded in 1948 by 12 nations. It has grown to 32 members with Sweden becoming the most recent. Three other countries - Ukraine, Georgia, and Bosnia and Herzegovina - have expressed interest in joining.



### Baltic States



## Ottawa Convention (UN)

- The Convention on the Prohibition of the Use, Stockpiling, Production and Transfer of Anti-Personnel Mines and on their Destruction is the international agreement that bans antipersonnel landmines.
  - It is usually referred to as the Ottawa Convention or the Anti-Personnel Mine Ban Treaty.
    - Signed :- 3 December, 1997
    - In force since 1 March, 1999
    - Signatories:- 164.....One country, the Marshall Islands, has signed but not ratified it.
    - Non-Signatories:- 34.....USA, China, Russia, India, Pakistan
- Landmines come predominantly in two varieties:
  - anti-personnel and anti-vehicle mines.
  - ⇒ Both have caused great suffering in the past decades and continue to kill and injure civilians and by-standers long after conflicts have ended.
  - ⇒ Anti-personnel mines are prohibited under the Ottawa Convention.
- Under the terms of the 1997 convention, countries were supposed to destroy all landmines stockpiles within four years, although not all have complied, according to the ICRE.
  - ⇒ Poland now says it is seeking to resume production.

### Objective of the Treaty:

- > To end the human suffering caused by anti-personnel mines.
- > To prevent civilian casualties, especially after conflicts end.
- > To assist in rehabilitating victims and restoring mined land for civilian use.

## Convention on Cluster Munitions

- Cluster is a type of explosive weapon which scatters submunitions ("bomblets") over an area.



- prohibits **all use, production, transfer and stockpiling** of cluster munitions
  - Adopted on 30 May 2008
  - signed on 3 December 2008
  - entered into force on 1 August 2010
  - Signatories:- 112 member states and 12 signatories yet to ratify it
  - Non-Signatories:- **India, the U.S., Russia, China, Ukraine, and Israel** have not signed due to military and strategic concerns.

### Withdrawals

- > **Lithuania** (during Russian invasion of Ukraine)–2024
  - > Only **Lithuania** and **Norway** were parties to the convention @ neighbouring Russia.
- ♦ The US, which had also not signed that convention, in 2023 transferred cluster munitions to Ukraine to help it defend itself against Russia.

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**07.04.2025**

**Credit card defaults  
up 28% last year,  
touched ₹6,742 cr**

#### **CREDIT CARD RECEIVABLES**

| Reporting period | Loans outstanding | NPAs outstanding |
|------------------|-------------------|------------------|
| 31-12-2020       | ₹1,40,522 cr      | ₹1,108 cr        |
| 31-12-2021       | ₹1,55,072 cr      | ₹3,182 cr        |
| 31-12-2022       | ₹1,97,041 cr      | ₹3,887 cr        |
| 31-12-2023       | ₹2,53,699 cr      | ₹5,250 cr        |
| 31-12-2024       | ₹2,92,447 cr      | ₹6,742 cr        |

Source: RBI

|                             |                                             |
|-----------------------------|---------------------------------------------|
| driven by                   |                                             |
| increased consumer spending | the growing popularity of digital payments. |

|                                       |                       |
|---------------------------------------|-----------------------|
| a significant rise in NPAs within the |                       |
| personal loan                         | credit card segments. |

- However, non-performing assets (NPAs), or the amount defaulted by customers, in the credit card segment have also risen by 28.42 per cent to Rs 6,742 crore during the 12-month period ended December 2024, according to the latest Reserve Bank of India data.

➤ **Credit card outstanding**

|                        |     |                            |
|------------------------|-----|----------------------------|
| is unsecured in nature | and | carry high interest rates. |
|------------------------|-----|----------------------------|

→ *A loan account becomes an NPA*

|                                                                         |
|-------------------------------------------------------------------------|
| when the interest or principal instalment is more than 90 days overdue. |
|-------------------------------------------------------------------------|

→ When a customer delays repayment of his credit card bill beyond the billing cycle,

|                                                                                            |     |                                 |
|--------------------------------------------------------------------------------------------|-----|---------------------------------|
| the bank charges a high interest rate of 42-46% interest per annum on the outstanding dues | and | his credit score also plummets. |
|--------------------------------------------------------------------------------------------|-----|---------------------------------|

# **REACHING OUT**

**BIMSTEC summit** was an opportunity that India seized to lend substance to its **Act East Policy**

▽ In elevating India's bilateral **ties with Thailand**

to a strategic level and giving a fresh impetus to

the Bay of Bengal regional forum,  
the Bay of Bengal Initiative for Multisectoral Technical and Economic Cooperation  
**(BIMSTEC)**,

PM Narendra Modi has

strengthened the Act East policy  
and  
deepened India's regionalism.

→ The summit *also provided a valuable opportunity to engage with leaders of two important neighbours –*

**Bangladesh**

and

**Myanmar.**

→ **Although Thailand is next door to the east of India**, and

the two countries are bound by  
historical and civilisational ties,

↓  
Bangkok did not acquire  
the strategic profile  
it deserves in Delhi's foreign policy map.

♦ **Indonesia, Malaysia, Singapore**

and more recently, **the Philippines**,

have dominated India's mind space.

**Thailand** is the **2<sup>nd</sup> largest economy in Southeast Asia**

but only the **4<sup>th</sup> largest trading partner for India.**

### **Thailand : Strategy**

Modi's brief sojourn in Bangkok, the **first bilateral visit in more than a decade**, has helped consolidate the efforts in the last few years in advancing bilateral ties.

Thanks to Bangkok's decision on **visa-free travel for India**,

Thailand has become a major destination of leisure travel for the Indian middle classes.

Meanwhile, there is growing cooperation between the security establishments of the two countries and two sides have now agreed to intensify defence and advanced technology cooperation, especially in outer space.

### **Myanmar : Strategy**

On the margins of the BIMSTEC summit, PM Modi met with the Senior General Min Aung Hlaing of Myanmar and offered assistance for the country to cope with the massive earthquake that has killed thousands and shaken a country already in deep crisis.

Growing instability in Myanmar marked by an intensifying civil war threatens to undo the very conception of BIMSTEC as a bridge between South and South East Asia.

Myanmar's increasing international isolation only makes matters worse.

### **Bangladesh : Strategy**

Modi's meeting with Muhammad Yunus, the chief advisor of the interim government in Bangladesh, is a welcome first step in defusing the tensions between Delhi and Dhaka that had escalated since the ouster of Sheikh Hasina from power last August.

While expressing

- ~ India's concerns on the violence against the Hindu minority in Bangladesh,
- ~ the hostile rhetoric emanating from the new government, and
- ~ the growing number of incidents on the border,

the PM has highlighted India's desire "to forge a positive and constructive relationship with Bangladesh based on pragmatism".

Delhi has a **strong incentive** in sustaining the progress in bilateral ties during the **Hasina years.**

It is also aware that without productive engagement with Dhaka, there is no way of building the BIMSTEC as a credible regional forum.

### **BIMSTEC : Journey since 1997**

- ♦ India's deepening bilateral cooperation with Thailand also augurs well for revitalising the BIMSTEC forum that brings together

| Five countries<br>in South Asia                        | Two countries<br>in South East Asia |
|--------------------------------------------------------|-------------------------------------|
| Bhutan,<br>Bangladesh,<br>India,<br>Nepal<br>Sri Lanka | Myanmar<br>Thailand                 |

- ♦ **Launched in 1997**, the forum has limped along without major advances in regionalism.
- ♦ The very conception of BIMSTEC as a **bridge between South and South East Asia**.

### **Pakistan : Cornering**

The Modi government has invested additional energies in rebooting BIMSTEC after it was clear at the 2014 Kathmandu summit of SSARC that Pakistan was not going to allow any steps towards the regional economic integration of the Subcontinent.

- India's efforts paved the way for greater institutionalisation of BIMSTEC in the form of a charter and more specific cooperation in a broad range of areas.
- The Bangkok summit saw the conclusion of a maritime transport cooperation agreement and adoption of a vision document for the forum.

# BIMSTEC

The Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation.



## OBJECTIVE

To accelerate the economic growth and social progress in the sub-region through joint endeavors in a spirit of equality and partnership.



## MAIN SECTORS OF COOPERATION

Trade & Investment, Transport & Communication, Energy, Tourism, Technology, Fisheries, Agriculture, Public Health, Poverty Alleviation, Counter-Terrorism & Transnational Crime, Environment & Disaster, Management, People-to-People, Contact, Cultural Cooperation, Climate Change.

## 6 JUNE 1997

is the establishment date of **BIMSTEC**.



## FACTORS

- BIMSTEC has headquarters in **Dhaka, Bangladesh**.
- BIMSTEC countries house **1.73 billion** people
- BIMSTEC has combined GDP of **\$ 4.4 trillion**.
- The current Secretary General of the **BIMSTEC** is Ambassador **Tenzin Lekphell** from **Bhutan**.

## BIMSTEC comprises of 7 Member Countries.

BIMSTEC is of utmost significance to India as it is major support in implementing its Act East Policy and the development of its ambitious 'Sagar Mala' project.





**09.04.2025**

## **RAJ BHAVAN GUARDRAIL**

**In holding Tamil Nadu governor's 'pocket veto' to be illegal, and setting deadlines to act on bills, SC has set welcome precedent**

▽ In a Decision that will reshape the relationship between the government and Raj Bhavan in states across the country, the Supreme Court on Tuesday came down heavily on Tamil Nadu Governor R N Ravi's undue delaying of bills passed by the state legislature, **describing a virtual "pocket veto" as "illegal" and "erroneous"**.

→ The ruling in The State of Tamil Nadu vs The Governor of Tamil Nadu reiterates a basic democratic principle:

- > The will of the people, as expressed through the legislature and elected government, must be respected.
- > At a time when a dismal pattern has emerged in non-BJP-ruled states, of tussle between governor and government, the Court has set a welcome precedent.
- > It has ruled that the office of the governor, even as it remains constitutionally significant, cannot be a parallel centre of power.

▽ This is not the first time the Court has cautioned governors against overreach.

→ In 2023, in State of Punjab vs Principal Secretary to Punjab Governor,

the Court had held that governors are bound to act

**in a timely manner**

on bills passed by the elected legislature

and that withholding assent without justifiable cause undermines the will of the people.

→ In 2023, days after the Supreme Court had raised serious concerns over inaction by governors, Ravi had returned 10 pending bills that were passed by the state legislature.

- > These dealt with a range of issues, including measures to address corruption, public appointments and amendments to state universities' governance.
- > The Court underscored that the **governor**, despite being a **titular head**, cannot impede legislative process and **must adhere to the guidelines of Article 200, which defines the powers of his office regarding assent to bills.**

- > It clarified that while the governor holds certain discretionary powers,  
     ~ decision-making primarily rests with the elected government.
- > *The court also invoked its **extraordinary powers** under **Article 142** of the Constitution to declare the 10 bills, which had been long delayed by Ravi, as having received assent.*

### **Article 200 interpretation by SC @ TN Govnr. case**

- ▽ Laying down the timeline for governors to decide on Bills, the judges referred to Article 200 which deals with the power of the head of the state to deal with Bills presented by the Assembly.
  - ▽ “As a general rule, it is not open for the Governor to reserve a Bill for the consideration of the President once it is presented before him in the second round after having been returned to the House previously as per the first provision... The only exception to this general rule is when the Bill presented in the second round is different from the one presented to the Governor in the first instance,” the bench said.
  - ▽ “In case of reservation of bills for the consideration of the President, contrary to the advice of the state Council of Ministers, the Governor shall make such reservation within a maximum period of three months... In case of presentation of a Bill after reconsideration in accordance with the first proviso (of Article 200), the Governor must grant assent forthwith subject to a maximum period of one month,” it said.
  - ▽ The Supreme Court said that the general rule is that the Governor, in exercise of his functions under Article 200, has to abide by the aid and advice tendered by the Council of Ministers. The only exceptions to this rule can be traced to the second proviso to Article 200 and Article 163 (1), respectively.
  - ▽ “Thus, only in instances where the Governor is by or under the Constitution required to act in his discretion would he be justified in exercising his powers under Article 200 contrary to the advice of the Council of Ministers,” it said and underlined that any exercise of discretion by the Governor in exercise of his powers under Article 200 is amenable to judicial review”.
-

## Summary Understanding hereabove :-

### Article 200 in Constitution of India

#### **200. Assent to Bills** (Summary of consisted 3 paras there)

- Bill passed by → Legislative Assembly or Legislative Assembly + Legislative Council  
→ Governor now with 3 available options :-
  - 1) Give assents
  - 2) Withhold assent
  - 3) Reserve @ consideration of President
- Can also RETURN the bill (if it is not a Money Bill) → request @ reconsider / certain amendment to L.A or L.A + L.C → → L.A or L.A + L.C presenting back with/without Amendment for Assent → Governor can't withhold assent.
- Provided further that the Governor shall not assent to, but shall reserve for the consideration of the President.

### Veto Power of the President and the Governor

- **Veto Power of the President** of India is guided by **Article 111** of the Indian Constitution.
- **Article 200** of the Indian Constitution deals with the powers of the Governor with regard to assent given to bills passed by the State legislature and other powers of the Governor such as reserving the bill for the President's consideration.
- **Article 201 pertains to 'Bills Reserved for Consideration'.**
- **Article 201:** If the Governor reserves a Bill for the President's consideration, the President holds the final say on the matter. The President has the option to:
  - **Grant Assent:** The President can approve the Bill, making it law.
  - **Withhold Assent:** The President may choose to withhold assent to the Bill.
    - For non-Money Bills, if the President withholds assent, the President can direct the **Governor to send the Bill back to the Legislature for reconsideration.**
    - The **Legislature is required to act within six months.**
    - If the Bill is passed again, it must be resubmitted to the President for final approval.
- **Article 207:** No Money Bill can be introduced in the assembly without the recommendation of the Governor of the State.

## President's Veto power

- **Article 111:** deals with the President's veto power over a bill passed by the **Parliament**.
- **Article 201:** deals with the President's veto power over bills passed by the **State Legislatures** and which are reserved for the consideration of the President.

## Different Veto power

- **Absolute Veto**– It means withholding assent to the bill passed by the legislature.
- **Qualified Veto**– It can be overridden by the legislature with a higher majority.
- **Suspensive Veto**– It can be overridden by the legislature with an ordinary majority.
- **Pocket Veto**– It means taking no action on the bill passed by the legislature.

## SC's verdict @ TN case @ President

- **Previously** → no specific timeline for Presidential assent.
- **Tamil Nadu case** → The SC held that the **President** cannot exercise an “**absolute veto**” by indefinitely delaying assent.
  - A decision must be made **within three months**, and any delay must be reasoned and communicated to the State.
  - Withholding assent must be based on sound and specific grounds, not done arbitrarily.
  - If the President fails to act within the time limit, States can file **writ petitions** to compel a decision, seeking a Writ of **Mandamus** from the Court.

The SC's interpretation on Article 201 establishes a clear three-month deadline for the President to act on state bills, enhancing accountability and reducing arbitrary delays.

- > Additionally, the SC stated that under **Article 143**, if a bill is reserved by the Governor on the

grounds of unconstitutionality, the President ought to seek the Supreme Court's opinion.

~ Although it is not mandatory, the reference to the SC in such cases carries high persuasive value.

### SC's verdict @ TN case @ Governor

- The Court ruled that there is **no concept of "absolute veto" or "pocket veto" under Article 200** and stated that governors **cannot indefinitely delay action on bills.**
  - SC noted that **Governors are bound to follow the advice of the Council of Ministers.**
- SC ruled that Governor must give assent to a bill when a bill is presented to him after **re consultation in state assembly** and he can only refuse assent when the bill is different.
  - The SC prescribed clear timelines for Governors when dealing with Bills with **one month** to withhold assent, **three months** if doing against State Cabinet advice, and **one month for Bills re-presented** after reconsideration.

| Difference regarding Assent                                                                                                                                                                           | Reason                                                                                                                            |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------|
| The SC clarified that unlike the Governor, who must assent to a State Bill if it is passed again after being returned.<br><br>The President is not constitutionally bound to do so under Article 201. | This is because <u>Article 201 applies only in exceptional cases</u> where state legislation has potential national implications. |

### Key committee recommendation @ Governor

| Committee                         | Recommendation                                                                                                                                                                                                                                                                       |
|-----------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Sarkaria Commission (1988)</b> | <ul style="list-style-type: none"><li>• Governors should not have statutory powers unrelated to their constitutional role.</li><li>• Governors should be appointed after consulting the Chief Minister.</li><li>• Governors should not have recent political affiliations.</li></ul> |

|                                         |                                                                                                                                                                                                                                                           |
|-----------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|                                         | <ul style="list-style-type: none"> <li>• Governors' role in university governance should be limited, with states having a greater say.</li> </ul>                                                                                                         |
| <b>Punchhi Commission (2010)</b>        | <ul style="list-style-type: none"> <li>• Governors should act on Bills within a fixed timeframe (six-month limit for reserved Bills).</li> <li>• Stricter safeguards against the misuse of Article 356 (President's Rule).</li> </ul>                     |
| <b>Venkatachaliah Commission (2002)</b> | <ul style="list-style-type: none"> <li>• Suggested that the appointment of Governors should be handled by a committee consisting of the Prime Minister, Home Minister, Speaker of the Lok Sabha, and the Chief Minister of the relevant state.</li> </ul> |

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### Quick Look:-

**Article 142 in Constitution of India :** This power is considered an *inherent power*, allowing the court to go beyond statutory limitations and ensure a fair and just outcome.

### **142. Enforcement of decrees and orders of Supreme Court and orders as to discovery, etc**

(1) The Supreme Court in the exercise of its jurisdiction may pass such decree or make such order as is necessary **for doing complete justice in any cause or matter pending before it**, and any decree so passed or order so made shall be enforceable throughout the territory of India in such manner as may be prescribed by or under any law made by Parliament and, until provision in that behalf is so made, in such manner as the President may by order prescribe.

(2) Subject to the provisions of any law made in this behalf by Parliament, the Supreme Court shall, as respects the whole of the territory of India, have all and every power to make any order for the purpose of securing the attendance of any person, the discovery or production of any documents, or the investigation or punishment of any contempt of itself.



### **Critical estimation @ Judicial overreach :-**

- The SC's timeline for the President apparently rests on this aspect, to close the loop that begins with the Governor and ends with the President.
  - But involving the President raises questions over Article 361, which protects the office, and the constitutional contours of the separation of powers.
  - By volunteering to rule on the constitutionality of a Bill under Article 143 – as distinct from an Act – the court pushes at the limits of the separation.
  - A writ of mandamus against the President is unusual since Article 361 of the Constitution bestows legal immunity for the President and Governors.
- 
- 

### **Bengal- School Appointment Scam** **SC sets aside HC order for CBI probe into creation of supernumerary posts**

- ▽ The bench also referred to **Articles 74(2)** and **163(3)**, according to which any **advice tendered by** the Council of Ministers to the President or Governor as the case may be **cannot be the subject matter of inquiry in any court.**
- Setting aside the HC order, the SC said, “Having regard to aforesaid discussion we are of the view that *the High Court was not justified in referring the issue of creation of supernumerary posts to CBI*, pursuant to the Cabinet decision, we take note of Articles 74(2) and 163(3) which specifically state that the question whether any, and if so what, advice was taken by the Cabinet of ministers to aid and advise the Governor shall not be inquired into in any court.”
- ▽ In its April 3 ruling, the SC said, “For candidates not specifically found to be tainted, the entire selection process has been rightly declared null and void due to the egregious violations and illegalities, which **violated Articles 14 and 16 of the Constitution**. As such, the appointments of these candidates are cancelled.”
-

## **Principle of “*corpus delicti*”**

- The legal doctrine of Corpus Delicti plays a crucial role in criminal prosecutions.
- The term, which translates from Latin as “**Body of the Crime**”, refers to the necessity of proving that a crime has occurred before convicting someone of committing it.
- This principle prevents wrongful convictions based solely on confessions without supporting evidence.
- In order to obtain a conviction, the prosecution must provide corroborating evidence to establish the corpus delicti.

## **Elements of Corpus Delicti**

To establish Corpus Delicti, two essential elements must be proven:

### **1. Proof that harm or loss has occurred**

- A crime must have taken place, such as a murder, theft, or arson.
- *Example* : A missing person is not enough to prove murder, evidence of foul play must exist.

### **2. Proof that the harm resulted from a criminal act**

- The harm or injury must have resulted from an unlawful act rather than natural causes or accidents.
- *Example* : If a house burns down, it must be proven that arson caused the fire, not an electric fault.

**The prosecution must establish these elements before securing a conviction.**

## **Application in Criminal Law**

The principle of Corpus Delicti is applied in various criminal offences :

### **1. Homicide Cases**

- A dead body or sufficient circumstantial evidence must prove that murder has occurred.
- Courts often require forensic evidence, medical reports, or eyewitness testimony.

### **2. Theft Cases**

- The prosecution must show that property was stolen and that it was taken unlawfully.

### **3. Arson Cases**

- Evidence must confirm that a fire was intentionally set, not accidental.

#### 4. White-Collar Crimes

- Financial crimes require proof of fraudulent transactions or embezzlement.

Without Corpus Delicti,  
convictions based solely on confessions are unreliable.

A crime can be proved  
via facts and circumstances  
forming concrete evidence.

**10.04.2025**

### **AIIMS researchers develop blood test to monitor cervical cancer treatment**

The study found that the levels of DNA fragments of **human papillomavirus (HPV) the virus responsible for the vast majority of cervical cancer cases** in the blood closely mirror the size of the tumour. As patients began treatment, the viral DNA levels dropped, offering a real-time snapshot of how the cancer was responding.

**With over 95% of cervical cancer cases linked to high-risk strains of HPV,** this test offers a promising, low-cost alternative to routine screenings and expensive follow-ups, which often become hurdles in cancer care.

“Cancer patients have to repeatedly undergo tests and scans to keep track of whether their cancer is responding to treatment and whether they remain cancer-free afterwards. Using the blood test instead can reduce this cost, with only those who have elevated biomarkers undergoing the full body scans,”

| Pap Smear                                                                                                                                             | Visual Inspection with Acetic acid                                                                                              | Biopsy                                                                                                                                                           |
|-------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| As of now, the <b>most common test</b> for cervical cancer screening is pap smear, where the cells collected from the surface of the cervix on a swab | The other commonly used test for screening, <b>especially in resource-scarce areas</b> , is visual inspection with acetic acid. | For the <b>final diagnosis</b> and staging of the cancer, patients usually have to undergo a biopsy.<br><br>This is also where the blood test may come in handy. |

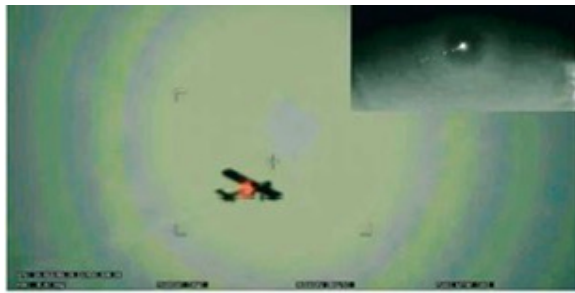
|                                                                  |                                                                                                                                                                 |  |
|------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|--|
| are studied under the microscope to check for cancerous changes. | For this test, a 3-5% solution of acetic acid is applied on the cervix,<br><br>which reacts with precancerous or cancerous cells to give a whitened appearance. |  |
| These tests are <i>used for screening</i> .                      |                                                                                                                                                                 |  |

**Cervical cancer is among the few vaccine-preventable cancers.** With almost all cervical cancer cases linked to persistent HPV infection, vaccines to prevent infection with the most common high risk strains can lower incidence and deaths.  
The government is considering HPV vaccination for girls **between the ages of 9 and 14** in India.

## HOW IT WORKS

- A blood sample is collected
- It's separated into components like plasma, red blood cells
- Circulating DNA is extracted from the plasma
- DNA is amplified and tested using a precise PCR technique

**14.04.2025**



## LASER POWER

■ The DRDO successfully tested a vehicle-mounted Laser Directed Weapon (DEW) MK-II(A), a cutting-edge weapon system used to bring down enemy drones and unmanned aircraft, in Andhra Pradesh's Kurnool on Sunday. With this, India joined an elite club of countries, including the US, Russia and China, that have the capability. *X/DRDO\_India*



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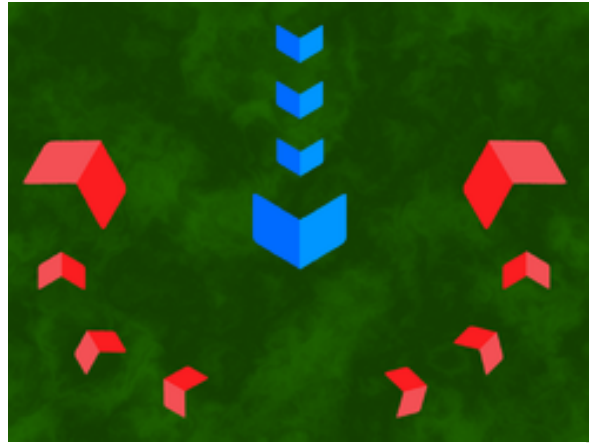
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### Quick Pick:-

#### **Pincer Movement**

noun

- a movement by two separate bodies of troops converging on the enemy.  
“ allied forces swept into the town from the south in a pincer movement”
- used in reference to a situation involving pressure from two different sides or forces.  
“ we are now caught in the pincer movement of rising domestic costs and a rising exchange rate”
- The **pincer movement**, or **double envelopment**, is a military maneuver in which forces simultaneously attack both flanks (sides) of an enemy formation. This classic maneuver has been important throughout the history of warfare.
- The pincer movement typically occurs when opposing forces advance towards the center of an army that responds by moving its outside forces to the enemy's flanks to surround it. At the same time, a second layer of pincers may attack the more distant flanks to keep reinforcements from the target units.
- The earliest mention of a pincer attack is in a related formation of Padmavyuha or Chakravyuha in the Indian Epic Mahabharata.



**19.04.2025**

## **Kailash Mansarovar Yatra to resume soon: Everything you need to know**

### **The Mansarovar yatra**

▽ Lake Mansarovar and the adjacent Mount Kailash

↓  
are located in the  
↓

Ngari Prefecture of the **Tibet Autonomous Region (TAR)**.

- Both are sacred to **Hindus**, who believe Kailash is the abode of Lord Shiva,  
- as well as **Buddhists, Jains**, and followers of the **Tibetan Bon religion**.

▽ Hundred of pilgrims make the journey to the region each year.

- 1<sup>st</sup>) They generally trek to **Lake Mansarovar**, and
- 2<sup>nd</sup>) **then** circumambulate the nearby **Mount Kailash**.

▽ Till the yatra was stopped in 2020, the **MEA** organized the pilgrimage for Indians *between the months of **June and September*** each year.

- The journey usually took **between 23 and 25 days**, and
- was open to anyone holding **Indian passports**,
- displaying **medical and physical fitness**, and
- between the ages of **18 and 70**.

▽ **Registrations** would generally open by **April-May**,

- after which a **draw** of lots would be held to fill the **limited slots** available.
- The **total cost** of the yatra was **upwards of Rs 2 lakh**.



## The two routes

▽ There are two primary routes to reach Lake Mansarovar from India.

| LIPULEKH PASS Route                                                                                                                                                                                                                                                                                                                                                                                              | NATHU LA PASS Route                                                                                                                                                                                                                                                                                                                                                                            |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p>The route through Lipulekh pass, which lies at an altitude of 5,115 metres in <b>Uttarakhand</b>,</p> <p>provides the <b>most direct pathway</b> from India to Mansarovar.</p> <p>But the <b>111 terrain</b> makes the journey <b>very challenging</b>.</p> <p>Currently, this route entails roughly <b>200km of hard trekking</b>.</p> <p>Before 2020, the route had been <b>operational since 1981</b>.</p> | <p>The route through Nathu La, which lies at an altitude of 4,310 metres on the <b>borders between Sikkim and TAR</b>, is over 1,500km long.</p> <p>But pilgrims can travel by <b>car or bus</b> all the way to the lake.</p> <p>They would <b>only</b> have to <b>trek 35-40 km</b> <u>for the circumambulation of Mount Kailas</u>.</p> <p>This route became <b>operational in 2015</b>.</p> |

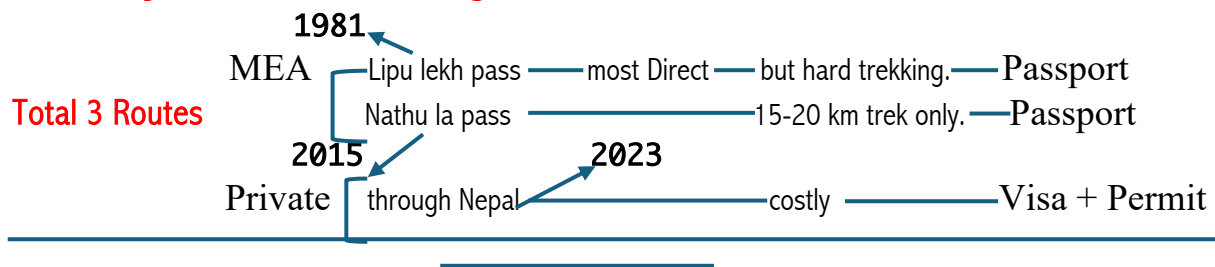
▽ While the **MEA portal allowed** pilgrims to provide a **preference route** during the registration, the **assignment** itself was **automated**. It was difficult to change routes once they had been assigned.

▽ Note that **no private operators can function on the two official routes**.

- There is, however a **third route through Nepal** on which **private company do operate**.
- This has been, in theory, **accessible to Indians since 2023**, when China reopened its border with Nepal.
- But **visa and permit requirements and high costs** have meant that few are likely to have availed this option.



## Summary Understanding :-



**22.04.2025**

## **How world's first market for trading in particulate emissions in Gujarat works**

▽ A New study on the world's first market for trading in particulate matter emissions,

launched in **Gujarat's Surat,**

found that it reduced pollution by up to 30% among participating industries.

- The Market also helped **lower abatement costs** – expenses incurred to reduce greenhouse gas (GHG) emissions.

## What is ETS?

### Summary Understanding :-

- An **emissions trading system**, also known as **emissions trading scheme** and abbreviated as **ETS**, → → is a market mechanism → → that allows those bodies (such as **countries, companies or manufacturing plants**) → → which emit (release) greenhouse gases into the atmosphere, → → to buy and sell these emissions (as permits or allowances) → → amongst themselves.

➤ An ETS is a **regulatory tool**

to **cut** GHG emissions or fine particulate pollution

while providing industries with **financial incentives**

to **comply with norms**

and

to get them to **invest in cleaner technologies.**

- Under ETS,
- regulators set a **cap**  
on the **total load of emissions**  
that **can be released into the air**.
- **Instead of enforcing** this cap → → *through fines or show – cause notices.*
- industries are **given emission permits or allowances**,  
which *can be traded to meet compliance*.
- **Each permit**
- allows industries  
to release a **specific quantum of emissions or pollution**  
into the air.
- **Plants that already have pollution-cutting technologies**  
**save their permits, and sell them to those**
- who might need them to **make up** for their **compliance gap**.
- This way, **plants with fewer resources**
- ↓  
**get time**
- ↓  
to **gradually shift** *to cleaner technologies.*
- ↓  
**while complying with a cap** *and others earn through trading.*
- A **minimum floor price and maximum ceiling price**
- ↓  
are usually set to maintain **stability** and to keep the scheme **attractive**.
- Industries that **breach emission caps are penalized**, and in some instances,  
they have to surrender their permits.
- To ensure that emissions are reduced, regulators tighten emission caps and issue fewer permits as the ETS matures.

## Why was the Surat-ETS launched?

- ▽ In India, pollution monitoring and enforcement work in a **command-and-control** system.
    - Under this system, **regulators** at the central and state level, such as **Central Pollution Control Board** and **State Pollution Control Boards**, spell out rules to regulate and enforce pollution norms.
    - If industries fail to comply with them, they face hefty fines and shutdowns.
  - ▽ However, given the **vast number of industries and limited manpower**, pollution **monitoring and compliance** can be **expensive and often inefficient**.
  - ▽ Also, with **uniform norms**, industries with varying resources have the same compliance burden with little flexibility. This gives an advantages as well as more negotiating power to larger plants.
- ↔ ETSs attempt to address these **monitoring and enforcement gaps** by bringing in **more flexibility**, and **offering incentives for compliance**.

---

### N.B:-

- ⇒ The **EU ETS** is the **first international trading system** for carbon dioxide emissions in the world and

↓  
applies **not only to the EU Member States** but also to the **other 3 members** of the **European Economic Area** – **Norway, Iceland and Liechtenstein.**

- ⇒ **Surat** → World's first **market** (not international)

---

RBI mandates 2.5% additional run-off factor on digital deposits

### WHAT IS RUN-OFF FACTOR?

■ The run-off factor refers to the percentage of deposits that could be withdrawn by depositors in a stress scenario.

**For OWN Curiosity (UPSC is not going to ask)**

# Catholics in the world

More than 7 out of 10 Catholics are today in Latin America, Africa, and Asia. Only a fifth live in Europe. This is due to trends of population growth, fall in religiosity, and recent scandals in the Catholic Church

## A broken ring, a secret conclave, and white smoke: How the new Pope will be chosen

**ANAGHA JAYAKUMAR**  
NEW DELHI, APRIL 21

POPE FRANCIS passed away on Easter Monday after a lengthy battle against bilateral pneumonia. Since 1415, all Popes bar one have died in office. Francis's predecessor Benedict XVI retired in 2013, citing a "lack of strength of mind and body".

### THE TRANSFER OF POWER

Detailed laws and rituals, some dating back to the Middle Ages, govern the transfer of power from one Pope to the next.

In April 2024, Pope Francis approved an updated version of the *Ordo Exsequiarum Romani Pontificis*, the liturgical book governing Papal funeral rites, which will guide the upcoming funeral Mass.

The passing of the pontiff has triggered the Interregnum, the intervening period between two Papacies.

Cardinal Kevin Farrell, the cardinal chamberlain (*camerlengo* in Italian), who serves as the treasurer of the Church and who must verify and announce the Pope's death, is now the *de facto* administrator of the Vatican.

Upon the Pope's passing, the Ring of the Fisherman, the signet ring bearing the seal of his Papacy, is broken off to symbolise the end of his rule. The Papal apartment is locked and sealed, and the *camerlengo* informs the College of Cardinals.

The Novendiale, or nine days of mourning, follows.

### THE SEDE VACANTE

The period of Sede Vacante, meaning "the Seat is vacant", has now begun.

Within 15-20 days, cardinals under age



White smoke rising from Sistine Chapel after Francis' election. Reuters

80 — there are 135 such cardinals at present — will arrive from all over the world to participate in the Papal Conclave. The cardinals will be sequestered in the Sistine Chapel in the Vatican, and will vote in several rounds until a single candidate enjoys a two-thirds majority.

### THE WHITE SMOKE

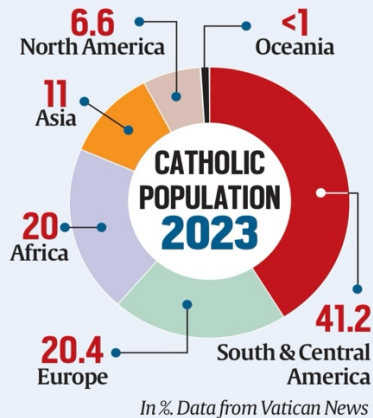
For each round of voting that does not yield a Pope, black smoke is traditionally released from the chapel. White smoke signals the election of a new Pope.

A representative from the College of Cardinals stands in the main balcony of St Peter's Basilica and announces, "*Habemus papam* (We have a Pope)" to the gathered crowd of faithful.

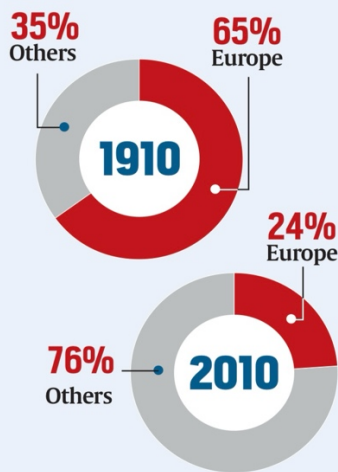
The new Pope, who chooses a name that usually honours a saint or a predecessor, then delivers his first address to the public from the balcony.



## MOST CATHOLICS TODAY LIVE IN GLOBAL SOUTH



## SHARE OF CATHOLICS IN EUROPE IS DOWN



*Source: Pew Research Center, 'The Global Catholic Population', 2013*

## 4 FACTS ABOUT POPES, PAPACY

**SAINT PETER** is regarded as the first Pope of Catholic tradition. His Papacy is believed to have begun in 30 CE and ended in 64 or 68 CE. There have been 266 Popes in the roughly 2,000 years of the Catholic Church's existence.

**JOHN** is the most popular name for a Pope, having been chosen 23 times. Gregory (16 times), Benedict (16, or 15 omitting the "Antipope" Benedict X,

times), Clement (14 times), Innocent (13 times), Leo (13 times), and Pius (12 times) have been other favoured names. 44 names have been used only once, including Peter.

**LONGEST PAPACY** was of Saint Peter, followed by Pope Pius X — 32 years from 1846-78. John Paul II was Pope for more than 26 years (1978-2005), and Leo XIII for over 25 years (1878-1903).

Pope Urban VII had the shortest Papacy of 13 days (Sept 15-27, 1590). He died of malaria before his consecration.

**PAPAL CONCLAVES** to choose the new Pope began in their present form following a decree by Pope Gregory V in 1274. The first Papal Conclave in the Sistine Chapel was held in 1492, after the death of Pope Innocent VIII (1484-92).

*Agencies*



**23.04.2025**

**ATTACK AT MEADOW NEAR PAHALGAM,**  
security forces launch search operations

**TRUMP DIALS MODI AS WORLD JOINS INDIA**  
in condemning attack; won't spare those behind it: PM

# Terrorists kill tourists in Kashmir

## THE MEADOW SITE



26 killed; Modi cuts short Saudi trip, Shah at attack site today

The site was packed with tourists when terrorists opened fire

## Modi's Saudi Trip

▽ 4 pacts signed :-

- 1) Space
- 2) Health
- 3) Anti -doping in sports
- 4) Postal departments

## Why Saudi Arabia is important for India

▽ Saudi Arabia is an important and reliable source of India's energy requirements.

→ India imports around 18% of its crude oil from Saudi Arabia,

making it the **2nd-largest** source of crude oil for the country.

→ It is also now **India's 4<sup>th</sup> largest trading partner** with bilateral trade at \$27.48 billion in 2017-18.

- Saudi investment of around \$100 billion is in the pipeline in areas ranging from energy, refining, petrochemicals and infrastructure to agriculture, minerals and mining.
- ▽ **Saudi Aramco** is participating in a major refinery and petrochemical project on India's west coast.
  - Defence, security, trade, culture, education and people-to-people contacts are the important areas of bilateral cooperation with Saudi Arabia.
- ▽ During his visit to New Delhi in February 2019, the Crown Prince had committed to invest over \$100 billion in sectors of priority in India.
- ▽ Demand from China is also receding *in the wake of a slowdown*.
  - Besides, competition in the oil market is expected to tighten with a **sanctions-free Iran entering** the global economic mainstream without any bars.
    - **In this context, India is a vital market for Saudi Arabia.**
  - There is believed to be **friction between Islamabad and Riyadh** *over the former warming up to Tehran and their growing energy cooperation*.

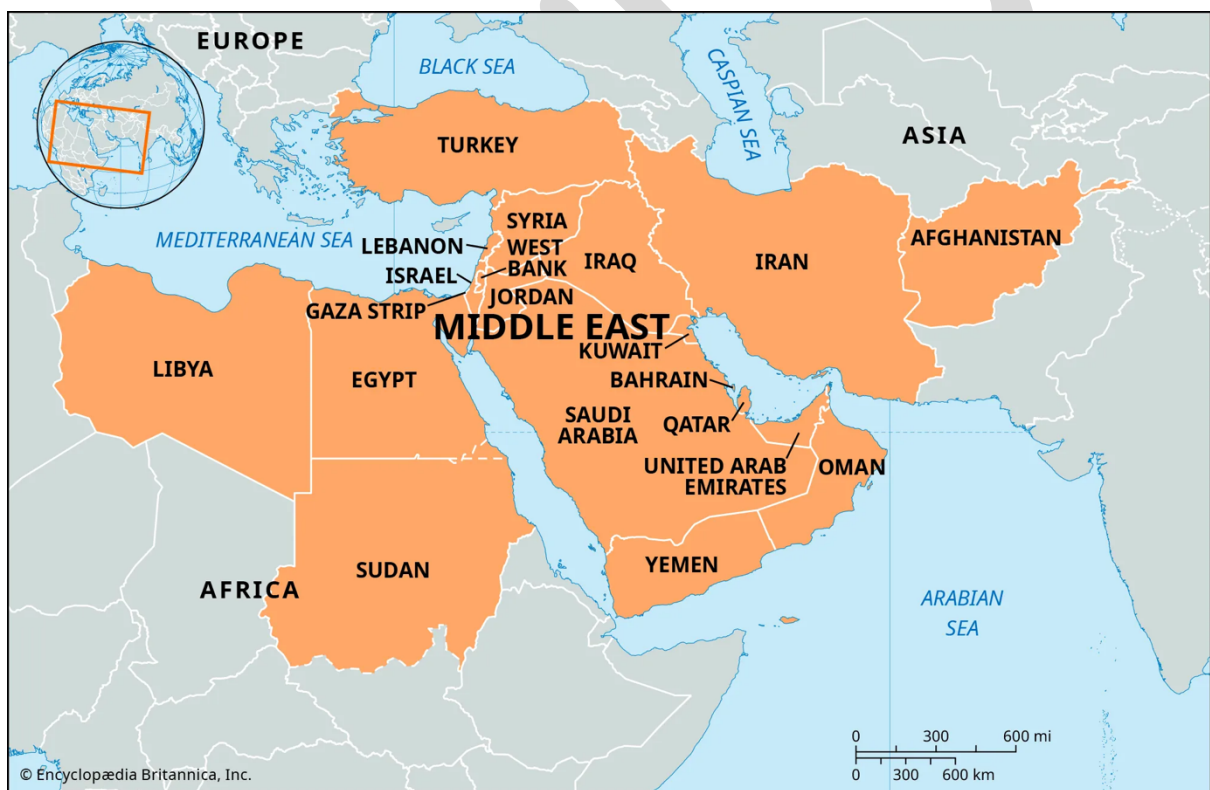
## Why India is important for Saudi Arabia

- *Pragmatism* is dictating Saudi posture as the very future of the kingdom's economic model is at stake.
- *Economic reform programs are underway in Saudi Arabia*, for which it needs India's economic as well as technological assistance.
- Saudi Arabia appears to *have limited experience in countering threats from groups like Houthi militias*.
  - This is an area where India's expertise in fighting such threats could be imparted to the Saudi side, by enhancing joint military training programs.

## Challenges for India

- The politics of the Middle East are complex and multidimensional.
- The **Saudi Arabia-Turkey rivalry** is one of the dimensions.
- Another dimension is the **Saudi Arabia-Iran rivalry**.
- **India has close relations with both Saudi Arabia and Iran.**
  - However, India is yet to work out a way to **balance** its

↓  
ties with Iran on the one hand  
and  
Saudi Arabia and the United States on the other.



**24.04.2025**

## Govt suspends Indus treaty, expels Pak advisors, cancels visas, closes Attari

### THE 5 DECISIONS

- Indus Waters Treaty of 1960 put on hold
- Attari Integrated Check Post shut
- SAARC visa scheme for Pakistanis stopped
- Military advisers in Pak mission to leave
- High Commission strength cut to 30

### Indus Waters Treaty (1960)

▽ The Indus Waters Treaty (IWT),

which has survived four wars, decades of cross-border terrorism against India by Pakistan, and a long history of antagonism between the two countries, was **suspended for the first time** by New Delhi on Wednesday.

### What is the Indus Waters Treaty?

▽ The IWT was **signed in Karachi** on September 19, **1960**, following nine years of negotiations between India and Pakistan.  
(Indian PM J.L. Nehru and Pakistan Prz Mhd Ayub Khan)

- The treaty has 12 Articles and 8 Annexures (from A to H).

▽ According to the provisions of the Treaty, all their water of the “**Eastern Rivers**” of the Indus system –

Sutlej,  
Beas and  
Ravi –

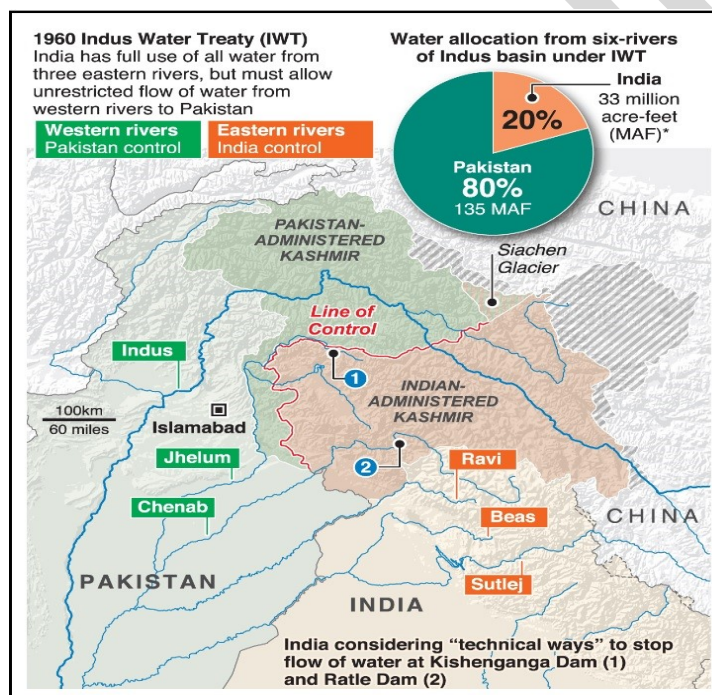
shall be available for the  
“**unrestricted use**” of India.

**Pakistan shall receive water** from the “**Western Rivers**” –  
**Indus, Jhelum, and Chenab.**

### So why is Indus decision by India significant?

- ▽ The decision to suspend the IWT will straightaway give more options to New Delhi on how to use the waters of the Indus river system.
- ▽ “For instance, India can immediately stop sharing water flow data with Pakistan. There will be no design or operational restrictions on India for the use of the water of the Indus and its tributaries.

- Also, India can now create storage on the Western Rivers, Indus, Jhelum and Chenab.”
- ▽ India can also stop visits by Pakistani officials to the **two hydroelectric projects** currently under construction in **Jammu & Kashmir** –
  - the **Kishenganga** HEP on Kishenganga, a tributary of the **Jhelum**,
  - and
  - the **Ratle** HEP on the **Chenab**
- ▽ “India can undertake reservoir flushing (*a technique used to remove accumulated sediment from reservoirs by releasing water through low-level outlets to scour out the sediment and transport it downstream*) on the Kishenganga project, which will increase the life of the dam,” he said.
- ▽ However, the suspension will not have an immediate impact on the flow of water to Pakistan for a few years at least.
  - India does not currently have the infrastructure to either stop the flow of water into Pakistan, or to divert it for its own use.



**25.04.2025**

## **Why Tamil Nadu banned egg mayonnaise**

Citing public health risks, the Tamil Nadu government has banned the manufacture, storage, distribution, and sale of mayonnaise **made using raw egg**. The **one-year ban** came into effect on April 8.



## What is mayonnaise?

▽ The government notification banning mayonnaise described the condiment as a

- “semi-solid emulsion containing
  - egg yolk,
  - vegetable oil,
  - vinegar, and
  - other seasonings”.

▽ Traditional mayonnaise contains three basic ingredients:

- 1) oil,
- 2) egg yolk, and
- 3) an acid, usually lemon juice or vinegar.

### □ Manufacturing Procedure :-

| Step -1                                                                                                                    | Step -2                                |
|----------------------------------------------------------------------------------------------------------------------------|----------------------------------------|
| It is made by whisking egg yolks with oil, which is added in small quantities, till one gets a thick, pale yellow mixture. | A dash of vinegar is added at the end. |

### □ Uses :-

- Mayonnaise is an ubiquitous ingredient in **fast food** around the world.
  - ~ From being used as a sandwich or burger spread, mayonnaise today is served with all kinds of foods, whether it be Levantine shawarmas or Nepali momos.

## Why was egg mayonnaise banned?

▽ Eggs are known to carry **many pathogens**, *which are usually neutralised in the cooking process (through the application of heat).*

- But **mayonnaise uses raw eggs**. The Tamil Nadu government notification said: “mayonnaise made of raw eggs is a high-risk food as it carries a **risk of food poisoning**”.
- This is especially relevant in **Indian conditions**, where “**improper preparation and storage**” amid **hot and humid weather** *creates additional risk of “contamination by microorganisms”.*
- The government notification specifically mentions **two common bacteria**.



| SALMONELA                                                                                                                                                                                                                                                                                | E.COLI                                                                                                                                                                                                                                                              |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p>This is a “a leading cause of <b>foodborne illness, hospitalisations, and deaths</b>” worldwide.</p> <p>Warm, humid, weather is the ideal condition for salmonella to grow.</p> <p>Symptoms of salmonella infection include <b>watery diarrhea, vomiting, and stomach cramps</b>.</p> | <p>While most E.coli strains are <b>harmless</b> – they are in fact important to the <b>digestive process</b> – certain kinds can cause severe illness.</p> <p>These are known to <b>infect the gut, the urinary tract, as well as other parts of the body</b>.</p> |

While these bacteria *can affect everyone*, they pose **more acute** risks to “immune-compromised individuals, children, and the elderly”.

**Raw eggs can harbour Salmonella bacteria**

### N.B: –

The mayonnaise market in India is dominated by **eggless versions**, anyway.  
[oil, acid (usually vinegar or lemon juice), and **emulsifiers** like aquafaba (chickpea water) or milk ]

Tamil Nadu is not the **first state to ban** egg mayonnaise – **Telangana** had imposed a one-year ban **last November**.

The TN government’s decision follows similar bans on gutka and paan masala, both identified as hazardous food products.

USA Population Trajectory

TELLING NUMBERS

As ‘pronatalists’ like Vance worry, here’s the latest on US population

**BIRTHS IN** the US increased by just 1% in 2024, still near the record low rates that have alarmed demographers, according to data released this week by the Centers for Disease Control and Prevention (CDC).

**THESE NUMBERS**, and the reasons for their consistent decline, are seen as a problem that could affect the US economy in coming decades, as fewer young workers support a growing aging population.

**PRESIDENT** Donald Trump has called for a “baby boom”. Leaders of the “pronatalist” movement such as Vice President J D Vance want more Americans to get married and have babies. The pronatalists worry about the impact of the disdain for family values and traditional gender roles on the US economy.

**3.6 MILLION+**

Babies were born in the United States last year.

**ONLY A 1%**

Increase over the record-setting low of 2023.

**1.6 FERTILITY RATE**

the number of births per woman over her lifetime – well below the 2.1 births needed to maintain the population.

**TEENAGE PREGNANCIES** have gone down substantially over the last several decades in the US – this is an important reason for the declining long-term trend.

The New York Times, with CDC Vital Statistics Report, April 2025

30.04.2025

The New Ottawa

Carney’s election offers a potential reset in strained India-Canada relations. Both nations stand to benefit

| Post- Trudeau resignation challenges                                                                                                                                                                       |                               | Trump’s hysteric Right approach                                                                                                                                                                                                                                        |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <i>When Justin Trudeau resigned as Prime Minister of Canada in January amid plummeting approval ratings, many considered the Liberal Party dead and buried ahead of general elections in that country.</i> | <b>Then came Donald Trump</b> | As the US President began his second term, <i>Canadian political discourse pivoted towards national pride</i> in response to Trump’s provocations, which included a <i>suggestion to annex Canada as the 51<sup>st</sup> American state and a wave of new tariffs.</i> |

|                                                                                                                                                                   |  |                                                                                                                                                                                                          |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| His replacement, Mark Carney, an unelected former central banker, <u>faced the formidable task of rescuing a flailing economy and reviving a fractured party.</u> |  | These developments rallied Canadians and gave Carney a platform.<br><br><b>Riding a wave of anti-Trump sentiment</b> , he has <u>led the Liberals to a surprising, albeit narrow, electoral victory.</u> |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

### Challenges to the newly elected Carney

- Carney may have emerged as the face of the Liberal Party's resurrection, but his challenges are far from over.
- He must now

confront serious economic headwinds  
and  
navigate an increasingly unpredictable  
global landscape shaped by  
Canada's southern neighbour.

### India's way looking lense view:-

- For India, a significant aspect of the election was the **downfall of Jagmeet Singh**, leader of the New Democratic Party (**NDP**), who **lost the parliamentary seat he had held since 2019.**

|                                                                                                      |                                                           |                                                                                                                                                                                                  |
|------------------------------------------------------------------------------------------------------|-----------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| The NDP <u>supported Trudeau's minority government from 2021 to 2024,</u>                            | With both Singh and Trudeau now relegated to a back seat, | Carney's election offers a potential reset in India-Canada relations,                                                                                                                            |
| but this time <b>failed to</b> meet the 12-seat threshold required for <b>official party status.</b> |                                                           | which have been strained for one-and-a-half years<br><br>after Trudeau's unsubstantiated allegations against India<br><br>over the killing of <u>Khalistani separatist Hardeep Singh Nijjar.</u> |

□

Nearly **two million people of Indian origin live** in Canada,  
and  
over **four lakh Indian students** currently study there.

- Beyond strong people-to-people ties,  
key sectors of collaboration include

pharmaceuticals,  
agri-tech,  
energy and  
climate change mitigation.

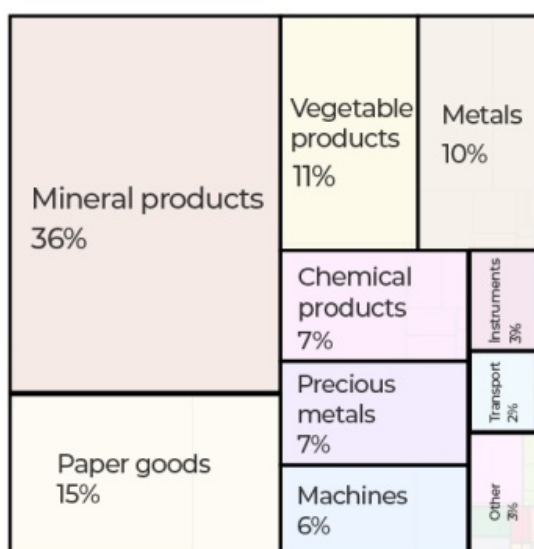
- **Notably, trade between the two countries has remained largely unaffected by the diplomatic fallout.**
- Canada has identified India as → → **a critical regional partner in its Indo-Pacific Strategy**, → → citing a shared interest in countering China's expanding influence.
- Carney's election, therefore, is an opportunity for renewed cooperation – provided **Canada is willing to address India's legitimate security concerns on the Khalistan issue.**
- > He has already signalled his intent to “rebuild” ties with India, calling the relationship “incredibly important”.
  - > Whether his government can go beyond the diplomatic gridlock of the Trudeau era and forge a meaningful alliance remains to be seen.

# Canada-India bilateral trade

Canada-India bilateral trade in goods reached nearly \$9bn in 2022, a substantial 57 percent increase over the previous year.

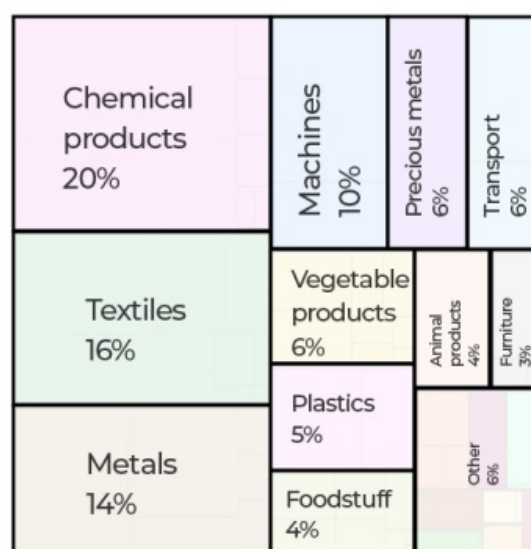
**Top Canadian exports to India**

(2021)



**Top Indian exports to Canada**

(2021)





# INDIA-CANADA RELATIONS

## HISTORICAL TIES

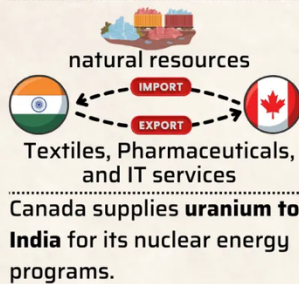
- Both countries were part of the **British Empire**, forming early links.
- '**Swadesh Sevak Home**' in Vancouver supported India's independence struggle
- Diplomatic relations established in **1947**.
- Canada hosts a large Indian diaspora, especially from Punjab.
- Both nations are part of the **Commonwealth**.

## CURRENT ISSUES

- Canada accuses India of assassinating **pro-Khalistan activist Hardeep Singh Nijjar**.
- Expulsion of senior diplomats by both countries.
- India's suspension of issuance of new visas for Canadian nationals.
- Canada's withdrawal of **crucial consular** services from key Indian cities.

## AREAS OF COOPERATION

**Bilateral trade** stood at **\$8.4 billion** in 2024.

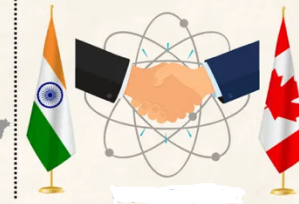


**Education**  
Over **300,000** Indian students study in Canada, a top destination for higher education.



**Collaboration in innovation**

**Canada-India Joint Science and Technology Cooperation Agreement**



**Agriculture**



Both nations work on agricultural research.



## CHALLENGES

- Khalistan Movement:** India views it as a national security threat due to perceived Canadian support
- Diplomatic Tensions:** Investigations and accusations have eroded trust between both nations.
- Economic Disruption:** Trade talks and visa services are suspended, impacting business and ties.
- Diaspora Politics:** Sikh communities influence foreign policy, adding complexity.
- Security Concerns:** India's concerns over Canada's perceived support for extremist groups.

## WAY FORWARD

- Regular high-level meetings through foreign ministers or bilateral summits to rebuild trust.
- Resume **Early Progress Trade Agreement (EPTA)** talks, focusing on clean energy and digital technologies.
- Collaborating in international forums like **G20 & UN** to focus on global challenges like climate change.
- Fostering **cultural diplomacy**, business partnerships, and soft power exchange.
- Diaspora as a bridge to spearhead cultural diplomacy, foster business partnerships, & soft power exchange.



**02.05.2025**

## **It Counts**

**Decision to hold caste census is very welcome. It's also a win for Opposition, carries promise of evidence shaping social justice**

### **Why in news?**

The Narendra Modi government's decision to hold a cast census with the next population Census is a turning point and a milestone. In a sense, it is the state catching up with the lived socio-economic and political reality.

| <b>Role of cast in India</b>                                                                                    | <b>and</b> | <b>politics around</b>                                                                           |
|-----------------------------------------------------------------------------------------------------------------|------------|--------------------------------------------------------------------------------------------------|
| Caste shapes hierarchy and discrimination, culture and belonging.                                               |            | Political parties have long recognised the power of caste as a mobilisational tool and category. |
| It plays a role in structuring opportunity and social mobility.                                                 |            |                                                                                                  |
| It influences choices and trajectories, from education to employment, and rituals of birth, death and marriage. |            |                                                                                                  |

### **Mandal Commission : Key info**

| <b>Key Information</b>                                                                                                                                                                 |                                                                                                                                                                                                                  |                                                                                                                                                                                                                          |                                                                                                                                                                                                                              |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>About</b>                                                                                                                                                                           | <b>Background and Purpose</b>                                                                                                                                                                                    | <b>Key Findings and Recommendations</b>                                                                                                                                                                                  | <b>Implementation and Impact</b>                                                                                                                                                                                             |
| Officially the <b>Socially and Educationally Backward Classes Commission</b> , was <b>established</b> in India in <b>1979</b> to identify and recommend measures for the upliftment of | The commission was <b>formed by the Janata Party</b> government under Prime Minister <b>Morarji Desai</b> .<br><br>Its mandate was to <u>identify and define "socially and educationally backward classes"</u> . | The commission found that <b>52%</b> of India's population belonged to Other Backward Classes ( <b>OBCs</b> ).<br><br>It recommended a <u>27% reservation in government jobs and educational institutions for OBCs</u> . | The Mandal Commission's report was <b>implemented by</b> the National Front government led by <b>V.P. Singh in 1990</b> .<br><br>The 27% reservation for OBCs in central government services and public undertakings sparked |

|                                                                                                                                                                                                                                                                                                                                                                                                                                                                |                                                                                               |                                                                                                                                                           |                                                                                                                                                                                                                                                                                                                                                                                                   |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p><b>socially and educationally backward classes (OBCs).</b></p> <p>Chaired by <b>B.P. Mandal,</b></p> <p>it <b>submitted</b> its <b>report</b> in <b>1980,</b></p> <p>recommending a <b>27% reservation in government jobs and educational institutions for OBCs.</b></p> <p>This recommendation, along with the <b>existing 22.5% reservation for SCs and STs</b></p> <p>was <b>implemented</b> in <b>1990,</b> leading to both support and opposition.</p> | <p>It was tasked with recommending measures to improve the conditions of these classes...</p> | <p>This recommendation was <u>intended to address <b>historical injustices and caste-based discrimination.</b></u></p> <p><b>(Affirmative Action)</b></p> | <p>both support and opposition.</p> <p>The implementation of the recommendations led to increased access to education and employment for OBCs.</p> <p>It also sparked political mobilization and a rise in caste-based politics.</p> <p>The Mandal Commission's report and its subsequent implementation have had a significant and enduring impact on India's social and political landscape</p> |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

### **Indira Sawhney v. Union of India (1992)**

The court upheld the 27% reservation for OBCs in **central government jobs and higher education**, but **excluded the "creamy layer"** (forward sections of backward classes with a certain income level) from these benefits. The court also emphasized that the **total reservation for SC/ST/OBC should not exceed 50%.**

| <b>Acceptance</b>                                                                    | <b>and</b>                                                                                                                                   | <b>Dissonance</b>                                                                                                                                   |
|--------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------|
| In 1990, with the acceptance of the recommendations of the Mandal Commission Report, | The Mandal moment made job and education quotas the centerpiece of affirmative action policies for OBCs at the Centre, but at the same time, | it also inaugurated a long period of dissonance – after all, <u><b>the government was framing caste-based policy without the empirical data</b></u> |

the central government acknowledged and affirmed what different state governments across the country had already responded to – the uprising of the middle castes or Other Backward Classes, and their demand for a more equitable participation and representation.

on caste that is necessary for evidence-driven policy.

That this glaring gap is now set to be filled is much-needed and enormously welcome.

### Incumbent Opposition party stand

▽ The **demand** for the caste census has been central to the **agenda of Congress**, and more specifically **Rahul Gandhi**, *for at least two years now.*

→ It was first heard prominently in the Karnataka assembly election in 2023, and it dominated the Lok Sabha poll campaign the following year.

### BJP – bid to wrest or turnaround

- The Modi government's Wednesday announcement can, therefore, be read as a vindication of its main opponent's plank, and as a bid to wrest it.
- It is also a turnaround for a party whose leader said only recently that he recognises only four castes – women, the poor, youth and farmers.

### Re-emergence of Caste-based politics?

By all accounts, ever since Mandal became a political force in the 1990s, rearranging the national political lexicon and giving rise to new caste-based parties, the politics of Mandir was seen as the political counter to it.

### Decline of the project of Hindutva consolidation /Binary politics?

▽ The project of Hindutva consolidation, went the argument, **was threatened by the caste-centric framework.** It soon became apparent, though, that the lines were shifting, and that the binary was not tidy.

→ Over the years, even as the original votaries of “social justice” let their political platform become faded and frayed – Congress, a late convert, has sounded more insistent than credible in its demands for the caste census – the BJP has proved to be agile in criss-crossing the political-ideological fence, and in planting its flag on the other side.

→ Its decision on the caste census now puts its imprimatur on a politics that it opposed to begin with, was awkward with for some time, and then purposefully worked to make its own.

## Future Implications

There is work to be done after the caste census announcement.

| Data Accuracy                                                                                                                                                   | Delimitation Exercise                                                                                                                                                                                                                | Quota cap may exceed 50%                                                                                                         |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------|
| The <i>design of the questionnaire</i> will be consequential, and there will be <i>the task of connecting the dots between the data and government policy</i> . | The caste census will also pave the way for the delimitation exercise – the OBC numbers and the gaps they point to may blunt the <b>north-south faultline</b> – and the implementation of <b>women's reservation in Parliament</b> . | It may lead to demands for <b>extending quotas</b> , and for removing the Supreme Court-mandated cap of 50 per cent reservation. |

## Conclusion

There are challenges ahead, but the fact that caste will finally be counted provides a robust, data-driven basis for policy and politics.

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**05.05.2025**

## **ICAR marks a first, develops two genome-edited (GE) varieties of rice**

Union Minister of Agriculture and Farmers' Welfare Shivraj Singh Chouhan released the two rice varieties at the ICAR's NASC Complex on Sunday.

| Name                            |                                        | Developed by                                                     | Technology                                                              | Characteristics                                                                                                                                                         |
|---------------------------------|----------------------------------------|------------------------------------------------------------------|-------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>1. DRR DHAN 100 (KAMALA)</b> | <b>World's first GE rice varieties</b> | Indian Council of Agricultural Research (ICAR), <b>New Delhi</b> | using <b>CRISPR-Cas SDN-1</b> (Site-Directed Nucleases-1) technologies. | <ul style="list-style-type: none"><li>- superior yields,</li><li>- less emissions,</li><li>- drought and salinity tolerance,</li><li>- less water consumption</li></ul> |

|                                                                                                                                                                   |  |                                                                                                                                                                            |  |                                       |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|---------------------------------------|
| <b>2. PUSA DST<br/>RICE 1</b>                                                                                                                                     |  |                                                                                                                                                                            |  | - high nitrogen-use efficiency traits |
| have <b>bred</b> improved GE mutants of the popular<br><br><b>Samba Mahsuri</b><br>(BPT-5204)<br><br>and<br><br><b>Cottondora Sannalu</b><br>(MTU-1010) varieties |  | Two of its affiliate institutions — the Indian Institute of Rice Research (IIRR), <b>Hyderabad</b> and the Indian Agricultural Research Institute (IARI), <b>New Delhi</b> |  |                                       |

#### Difference between GM and GE

| GM                                                                                                                                                                                                                                                                                                                       | GE                                                                                                                                                                                                                                                                |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <ul style="list-style-type: none"> <li>- involves <b>introduction of genes from unrelated species</b> into host plants.</li> <li>- These could, for example, be genes from <i>Bacillus thuringiensis</i>, a soil bacterium, that code for the production of proteins toxic to various insect pests in cotton.</li> </ul> | <ul style="list-style-type: none"> <li>- GE, on the other hand, entails <b>mere “editing” of genes naturally present in the host plant</b>, leading to mutation or changes in their DNA sequence.</li> <li>- No foreign genes or DNA are incorporated.</li> </ul> |
| <b>Technology used</b>                                                                                                                                                                                                                                                                                                   | CRISPR-Cas uses <b>“Cas” enzymes, or proteins that act like molecular “scissors”</b> , to cut and modify the DNA sequence <i>of a native gene at its targeted location</i> .<br><br>Such editing is intended to bring forth desirable                             |

|  |                                                     |
|--|-----------------------------------------------------|
|  | alterations in that gene's expression and function. |
|--|-----------------------------------------------------|

| Technology used here in two                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      | How does it work?                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p><b>1) Samba Mahsuri</b> (BPT-5204)</p> <p>In this case, scientists at IIRR have used the <b>CRISPR-Cas12 protein</b> for editing the 'cytokinin oxidase 2' gene (also called <b>Gn1a</b>) in Samba Mahsuri rice, in order to the increase the number of grains produced from each panicle (plant earhead) of this variety.</p> <p><b>Cytokinins (CK)</b> are a class of plant hormones that</p> <ul style="list-style-type: none"> <li>◦ promote cell division, or cytokinesis, in plant roots and shoots.</li> <li>◦ <u>They are involved primarily in cell growth and differentiation</u></li> <li>◦ but also affect apical dominance, axillary bud growth, and leaf senescence.</li> </ul> | <p>The <u>Gn1a gene basically codes for an enzyme that regulates the number of grains per panicle</u>, thereby indirectly influencing yields.</p> <p>Through “editing”, the scientists are able to reduce the expression of that gene, leading to an increase in the number of grains per plant.</p> <p>-----</p> <p><b>Summary understanding of both :-</b></p> <ol style="list-style-type: none"> <li>1) Edit Gn1a that prevents yields</li> <li>2) Edit DST that prevents yields</li> </ol> <p>-----</p> |



**2) Cottondora Sannalu (MTU-1010)**

The **CRISPR-Cas9 protein** has been used similarly to edit the ‘DST (drought and salt tolerance)’ gene in the MTU-1010 or Cottondora Sannalu rice variety,

| Samba Mahsuri<br>cultivating regions                                                                                                                                                                                                                                                   | IET-32072 or ‘Kamala’<br>Advanced features                                                                                                                                                                                                                                    |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <ul style="list-style-type: none"> <li>1) Tamil Nadu</li> <li>2) Andhra Pradesh</li> <li>3) Telangana</li> <li>4) Karnataka</li> <li>5) Odisha</li> <li>6) Chhattisgarh</li> <li>7) Bihar</li> <li>8) Jharkhand</li> <li>9) West Bengal</li> <li>10) eastern Uttar Pradesh.</li> </ul> | <p><b>Higher yield</b> per tonnes/hectare than the parent’s corresponding average.</p> <p><b>Same grain attributes and cooking quality</b> “exactly like the original variety”,</p> <p>with <b>earlier maturity</b> of 15-20 days in about 130 days (from seed to grain).</p> |

| Cottondora Sannalu<br>(MTU-1010) varieties<br>cultivating regions                                                | PUSA DST RICE 1<br>Advanced features                                  |
|------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------|
| <ul style="list-style-type: none"> <li>1) Tamil Nadu</li> <li>2) Andhra Pradesh</li> <li>3) Telangana</li> </ul> | To be cultivated in <b>areas prone to drought and salinity stress</b> |

|                             |                               |
|-----------------------------|-------------------------------|
| 4) Karnataka                | Higher yields                 |
| 5) Odisha                   |                               |
| 6) Chhattisgarh             | Earlier maturity              |
| 7) Bihar                    |                               |
| 8) Jharkhand                | Producing long slender grains |
| 9) West Bengal (Zone III)   |                               |
| 10) Uttar Pradesh           |                               |
| 11) Puducherry              |                               |
| 12) Kerala (Zone VII)       |                               |
| 13) Maharashtra,            |                               |
| 14) Madhya Pradesh (Zone V) |                               |

### Environment (Protection) Act of 1986 : GE crops exempted

- > India has exempted GE crops from biosafety regulations under the Environment (Protection) Act of 1986.

### Environment (Protection) Act of 1986 : GM crops included

These regulations govern both field trials and release for commercial cultivation in the case of GM crops that are **treated as “hazardous substances”** under the Act.

### Paving Way

The ICAR statement said that the development of the two GE rice varieties has paved the way for using this technology for **higher yields, climate resilience, and improved quality traits in oilseeds, pulses and other crops too.**

### Budget Allocation

The **2023-24 Union Budget** had allocated **Rs 500 crore** for GE breeding and research in agriculture.

### Patent (IPR) Issue

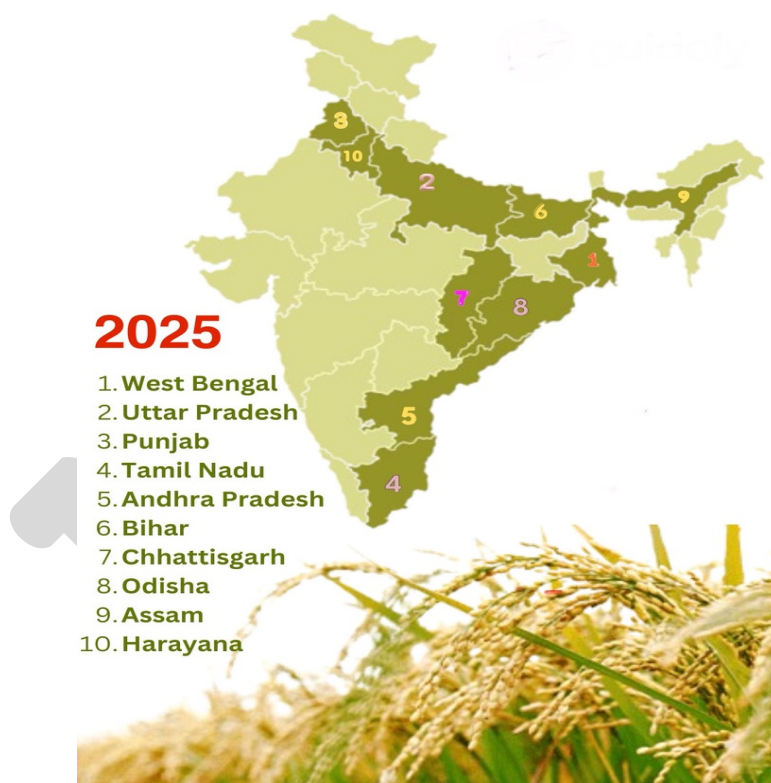
The statement conceded there are still issues over intellectual property rights on the CRISPR-Cas9 technology, which is patented by the Broad Institute of **MIT and Harvard**. Its use is

licensed. The IPR concerns “are being looked after and will be resolved in coming times,” ICAR said.

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### **Why is this breakthrough in paddy so significant?**

- > Paddy is India’s principal crop of the **kharif season**.
  - It is grown on **1/3<sup>rd</sup>** of the entire area under all foodgrain crops.
  - It contributes about **40% to the country’s foodgrain basket**, and is critical to the nation’s food security.
- > West Bengal, Uttar Pradesh, Punjab, Odisha, Andhra Pradesh, Telangana, Tamil Nadu, Chhattisgarh, Bihar and Assam are the main paddy growing states.



| Rice story : India                                                                                                          |                                                                                                                 |                                                                                                                                                                                            |                                                                                                                                                                                                                                                                                  |
|-----------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Area wise                                                                                                                   | Production wise                                                                                                 | Yield wise                                                                                                                                                                                 | Export                                                                                                                                                                                                                                                                           |
| <p><b>Highest</b> in the world</p> <p>Paddy (kharif and rabi together) accounted for 45 million hectares of area (2020)</p> | <p><b>Second</b></p> <p>1) <b>China</b><br/>(211 million tonnes)</p> <p>2) India<br/>(186.5 million tonnes)</p> | <p><b>Lower then world average</b> (4,717 kg/ha)</p> <p>1) <b>China</b><br/>(7,043 kg/ha),</p> <p>2) <b>Indonesia</b><br/>(5,128 kg/ha)</p> <p>3) <b>Bangladesh</b><br/>(4,809 kg/ha).</p> | <p><b>1) India</b></p> <p>2) Thailand</p> <p>3) Vietnam</p> <p><b>4) Pakistan</b><br/>(competing India in premium varieties esp. Basmati)</p> <p>5) USA</p> <p>6) <b>China</b><br/>(largest consumer)</p> <p>7) Myanmar</p> <p>8) Brazil</p> <p>9) Cambodia</p> <p>10) Japan</p> |

**Is India developing other genome-edited varieties of crops as well?**

- > **Yes**, research programmes on genome-editing have been initiated for other crops including oilseeds and pulses as well.

07.05.2025

WILL ENHANCE BILATERAL TRADE, RAISE LIVING STANDARDS

# Deal's done: India-UK Free Trade

## 'HISTORIC... LANDMARK'

Mutually  
beneficial,  
will deepen  
partnership  
PM MODI



Fantastic,  
delivering  
on our Plan  
for Change  
PM STARMER

### WHAT INDIA GETS

UK to end tariffs on  
footwear, textiles,  
automobile components,  
electrical machinery,  
minerals and more

### WHAT U.K. GETS

India to cut tariffs on  
whiskey, gin, automobiles,  
cosmetics, lamb, salmon,  
chocolate, biscuits  
and more

## PRODUCTS ON WHICH DUTY WILL BECOME ZERO

### AGRI AND PROCESSED FOODS

| SECTOR                 | DUTY RANGE | UNDER FTA |
|------------------------|------------|-----------|
| Animal products        | Upto 20%   | 99.3% *   |
| Vegetable/Oil products | Upto 20%   | 99.8% *   |
| Processed food         | Upto 70%   | 99.7% *   |

\*Tariff Lines at Zero duty

### INDUSTRIAL GOODS

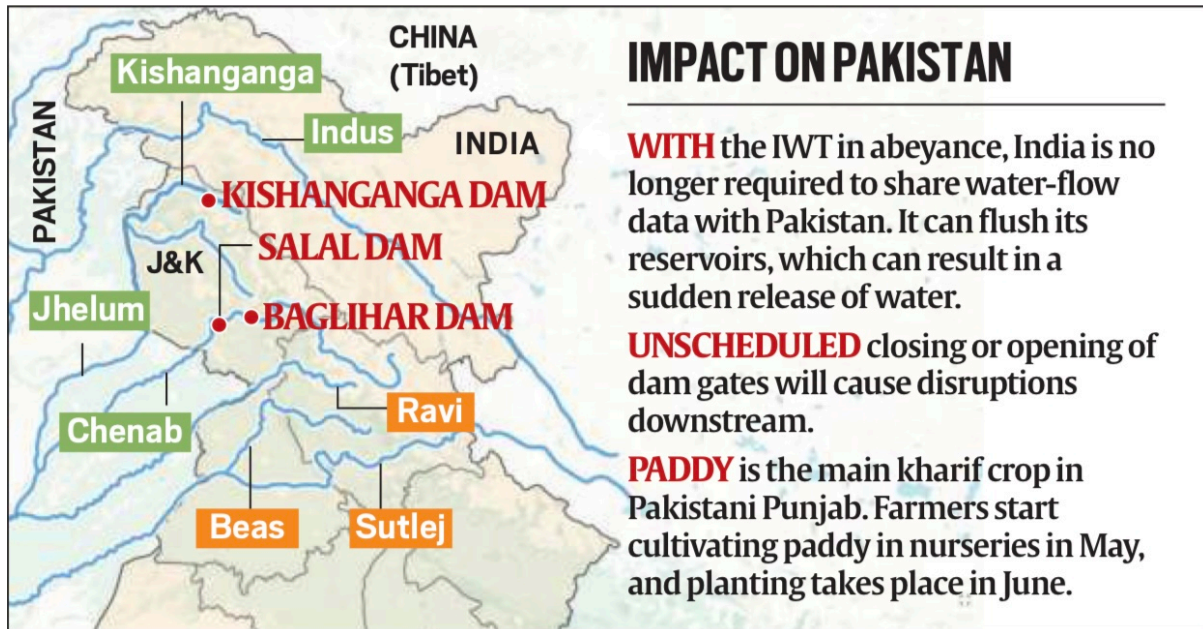
| SECTOR                 | DUTY RANGE | UNDER FTA |
|------------------------|------------|-----------|
| Minerals               | Upto 8%    | Zero Duty |
| Chemicals              | Upto 8%    | Zero Duty |
| Plastic/Rubber         | Upto 6%    | Zero Duty |
| Leather/Footwear       | Upto 16%   | Zero Duty |
| Wood/Paper             | Upto 10%   | Zero Duty |
| Textile/Clothing       | Upto 12%   | Zero Duty |
| Headgear/Glass/Ceramic | Upto 12%   | Zero Duty |
| Gems & Jewellery       | Upto 4%    | Zero Duty |
| Base Metals            | Upto 10%   | Zero Duty |
| Mechanical Machinery   | Upto 8%    | Zero Duty |
| Electrical Machinery   | Upto 14%   | Zero Duty |
| Transport/Auto         | Upto 18%   | Zero Duty |
| Instruments/Clocks     | Upto 6%    | Zero Duty |
| Arms/Ammunition        | Upto 2%    | Zero Duty |
| Furniture/Sports goods | Upto 4%    | Zero Duty |
| Works of art           | 0%         | Zero Duty |





# India's large dams on the Chenab

Under Indus Waters Treaty, Chenab is controlled by Pak. But India can build run-of-the-river plants on it



## IWT and Chenab

The IWT identifies the **Chenab** as one of the **three "Western Rivers"** (along with the **Indus** and **Jhelum**) which Pakistan controls.

However, **India is allowed restricted use** of the waters of the three Western Rivers for

- domestic use,
- non-consumptive use,
- agricultural use (as set out in Annexure C of the IWT), and
- generation of hydro-electric power (Annexure D).

To generate hydroelectric power, **India is allowed to build run-of-the river plants** on all the three Western Rivers.

A run-of-the river plant generates power from the natural flow of water.

Both **Salal** and **Baglihar** on the *Chenab* are run-of-the river projects.



## **Story of Alcatraz: Tourist hotspot that Trump wants to turn back into a prison**

- ▽ United States President Donald Trump said on Sunday that he had directed the **reopening and expansion of Alcatraz**, *the notorious former prison on an island off San Francisco, closed more than 60 years ago.*
- ▽ Considered **one of the toughest prisons of its day**, the facility housed some of the most infamous criminals in the US.

### **From fort to prison**

- ▽ The prison was **originally a defence fort** *on Alcatraz Island, about 2km offshore.*
  - > In 1846, the **US gained control** of the island after John C Fremont, then **military governor of California**, bought it from **naturalized Mexican citizen** Francis Temple in the name of the federal government.
  - > Four years later, President Millard Fillmore recognised the island's strategic military value and reserved it for "public purposes".
  - > A fort was built on the island, with the initial structure completed in 1858. Around 100 cannons and military men were stationed there.
  - > However, over time, the fort's necessity for defence purposes diminished (Alcatraz never fired its guns in combat).
  - > **As it was isolated from the mainland due to the strong Pacific Ocean currents, Alcatraz became a secure detention centre.**
  - > By the late 1850s, the fort was being used as a military prison to house various military personnel.
  - > ***In 1907, the structure was formally designated a US military prison.***
  - > The reconstruction took place between 1910 and 1912.

### **Morphing into Devil's Island**

- ▽ **Alcatraz stopped operating as a military prison** in 1933 due to the increasing maintenance costs.
  - > It was **then** acquired by the US Department of Justice, which **turned it into a federal prison.**
  - > In 1934, **becoming America's first maximum-security civilian penitentiary.**
  - > **The facility housed notorious criminals such as gangster.**
    - Prisoners typically arrived in Alcatraz in handcuffs and ankle shackles.

- Their daily life was harsh, and they were given **only four rights – food, clothing, shelter, and medical care.**
- Other privileges, such as corresponding with family members, had to be earned through hard work.
- > As a federal prison, there were 14 **escape attempts** by 34 prisoners at Alcatraz.
  - Nearly all prisoners who tried to escape were believed to have drowned or were shot dead by guards or recaptured.

## Closure and later years

- ▽ Alcatraz was **very expensive to run** – a 1959 report found that its operation cost three times that of a comparable prison.
  - The **perpetual salt exposure** corroded the prison's structures, requiring repair work worth \$5 million.
  - The prison was **finally shut** on March 21, **1963.**
- ▽ In 1969, a group of Native American students, known as "Indians of All Tribes", arrived at Alcatraz by boat.
  - They occupied the island to raise awareness about the discrimination faced by Indigenous populations.
  - The students remained there for about 19 months, after which federal marshals moved in and forcibly removed them.
- ▽ In **1972**, the island came under the National Park Services, and it **opened for tourists in 1973.**

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## Quick Look :-

- ▽ Alcatraz Island, about 2km offshore @ San Francisco
- ▽ A private property @ Mexican citizen
- ▽ Bought by US military governor of California in the name of federal govt.
- ▽ **Defence fort** was built @ 1858
- ▽ Alcatraz became a **secure detention centre**.....As it was isolated from the mainland due to the strong Pacific Ocean currents.
- ▽ 1907 → → turned into **military prison**
- ▽ 1933 → → turned it into a **federal prison.**
- ▽ In 1934, becoming America's first maximum-security civilian penitentiary  
→ → housed notorious criminals such as gangster → → were given only four rights -- food, clothing, shelter, and medical care.
- ▽ **Escape attempts** → have drowned or were shot dead by guards or recaptured.
- ▽ **Closure** → → 1) very expensive to run.    2) perpetual salt exposure

- ▽ **Final Shut → → 1963**
- ▽ In 1969, a group of Native American students, known as “Indians of All Tribes”, arrived at Alcatraz by boat → → They occupied the island to raise awareness about the discrimination faced by Indigenous populations.
  - remained there for about 19 months → was forcibly removed.
- ▽ **Conversion to Tourist Spot → →** In 1972, the island came under the National Park Services, and it opened for tourists in **1973**.

---

## **Guantánamo Bay detention camp,**

- ▽ **U.S. detention facility** on the Guantánamo Bay **Naval Base**, located on the coast of Guantanamo Bay in **southeastern Cuba**.
- ▽ At Guantánamo, the US government sought to hold detainees in a place where **neither US nor international law applied**.
- ▽ Constructed in stages **starting in 2002**, the Guantánamo Bay detention camp (often called Gitmo, which is also a name for the naval base) **was used to house Muslim militants and suspected terrorists captured by U.S. forces in Afghanistan, Iraq, and elsewhere....War on Terror @ 9/11**
- ▽ The facility became the focus of **worldwide controversy** over alleged violations of the legal rights of detainees under the Geneva Conventions and accusations of torture abusive treatment of detainees by U.S. authorities.
- ▽ **Still open?**
  - **Yes**, the Guantanamo Bay detention camp is still open.
  - While the number of detainees has decreased, it remains a functioning facility with a significant number of individuals still held (15 men).
  - There have been numerous efforts to close the facility and transfer detainees, but the camp continues to operate under the US military's jurisdiction.
- ▽ **Republican push**
  - **Barack Obama** made closing down the prison one of his top promises when he was running for president in 2008, but after taking office, his plans faced strong Republican opposition. Towards the end of his second term, Obama expressed regret over failing to shut down the facility early in his presidency.
  - **Biden** when entered office → 40 prisoners

When left office → 15 prisoners  
→ While President-elect (now incumbent) **Donald Trump** has previously pledged to keep the prison open.



**08.05.2025**

## **With nine strikes, India underlines its new message to Pakistan**

**Operation Sindoor** says unequivocally that terrorists and their camps, wherever they may be in Pakistan, are no longer off-limits for India's military. Delhi has its task cut out for the day after, Islamabad must look within

- ▽ India's anticipated military response to the **killing of 26 innocent people at Pahalgam in Kashmir** last month came in carefully calibrated fashion in the early hours of Wednesday.
  - > India's **initial reaction** was focused on → → **diplomatic, economic, and political measures**, and included the decision to keep the **1960 Indus Waters Treaty in abeyance**.
  - > That India would use military force in retaliation against the Pahalgam butchery on April 22 was never in doubt.
    - *No government in the world would tolerate an attack so brutal in nature that picked out men of one religious community and gunned them down in front of their families.*
    - Although India has seen many terror attacks from Pakistan over the last four decades, few of them were as outrageous as this one.
    - The Pahalgam strike aimed at ending the recent period of peace and stability in Jammu and Kashmir and provoking communal conflict in India.
    - Avenging the attack was inevitable, but the question was about its nature and timing.
- ▽ **Instead of rushing into an automatic reaction**, *the government chose to wait and prepare an effective military response.*
  - > *The intervening two weeks were also used to make India's political case to the **international community** on Pakistan's complicity in the terror attack and for mobilising friends and partners to support India in the current crisis.*
  - > **Barring China and Turkey**, close friends of Pakistan, the international response to Indian diplomacy has, in general, been positive.
  - > The success of the Indian diplomatic effort was visible in the *refusal of a closed door meeting* this week of the **United Nations Security Council**,
    - convened at Islamabad's request,

- to support Pakistan's argument
  - that Pahalgam was an Indian false flag operation and that Delhi must be restrained from any military response to the terror attack.
- > Much of the international community called for restraint on both sides, but Delhi was not going to forego its right of self-defence in face of the brazen terror in Pahalgam.
- ▽ The exercise of that right unfolded through targeted airstrikes on nine sites linked to Rawalpindi's terror infrastructure in Pakistan occupied Kashmir and west Punjab.
- > While the full assessment of their impact is awaited, the airstrikes appear to have inflicted considerable damage on the terror hideouts while limiting collateral civilian damage.
  - > They also sent a clear message that terror camps, even deep inside Pakistan, were no longer off-limits for the Indian military.
- ▽ Unlike in the past, when India was hesitant to attack Pakistani territory, the airstrikes targeted well-known terror camps in **Sialkot, Muridke, and Bahawalpur — all in west Punjab.**
- > Briefing the media on Wednesday, *Foreign Secretary* Vikram Misri described India's airstrikes as "**measured, non-escalatory, proportionate, and responsible.** They focused on dismantling the terrorist infrastructure and disabling terrorists likely to be sent across to India."
  - > They are also meant to "**pre-empt as well as deter** more such cross-border attacks", said Misri.
- ▽ In emphasising the "responsible and proportional" nature of the Indian military response, Misri was underlining that **India has no desire for further escalation.**
- ▽ But the **Pakistan Army** has a vote in how the situation evolves from here.
- The signals from Pakistan have been mixed.
  - **Prime Minister** Shehbaz Sharif has **pledged retaliation** and the foreign office in Islamabad has said its armed forces would respond at a time and place of its choosing.



## **Operation Sindoor: From HAMMER to BrahMos, the precision guided long range weapons in Indian military's arsenal**

Over the past several years, the Indian military has built up a formidable arsenal of new-age weapons that includes a range of precision-guided long-range weapons and drones, including loitering munitions.

### **HAMMER:** (The Highly Agile and Manoeuvrable Munition Extended Range)

- Built by the **French** aerospace, defence, and security corporation **Safran**
- air-to-ground
  - precision-guided weapon system
  - for the Rafale fighter aircraft
  - has a range of up to 70 km, and
  - can also be fitted to bombs and various guided systems.
  - the system is autonomous and insensitive to jamming, and can be launched from a low altitude over rough terrain.
- the weapon system is autonomous and insensitive to jamming, and
  - can be launched from a low altitude over rough terrain.
- the weapon system is highly versatile, and
  - can be used for precision strikes against a range of targets in **medium-range tactical operations.**

□ India has bought several of these weapon systems over the last few years.

**French @ Safran**  
**Medium Range**  
**Air-to-ground**

**Precision strikes → → fitted to bombs and various guided systems.**  
**insensitive to jamming**

### **SCALP:**

- manufactured by the **European multinational MBDA**
- an air-launched cruise missile with stealth features, designed for long-range deep strikes.
- has a range of 450 km, and is difficult to detect due to its low-flying capability when fired from an aircraft.
- Its advanced and highly accurate navigation system, which uses **Inertial Navigation System (INS)**, **Global Positioning System (GPS)** and **terrain referencing**, can penetrate bunkers and ammunition stores.

→ SCALP-EG (Système de Croisière Autonome à Longue Portée — Emploi Général), known as **Storm Shadow in Britain**, can be operated at night and in all weather conditions.

**European multinational MBDA**

**Cruise missile**

**Long Range**

**Air-to-Air**

**Deep strikes → → can penetrate bunkers and ammunition stores.**

**Stealth features → → difficult to detect due to its low-flying capability**

**METEOR:** The Meteor is a new-generation **Beyond Visual Range Air-to-Air Missile (BVRAAM) system** which is effective in dense electronic-warfare environments.

According to its manufacturer MBDA, the missile's **solid-fuel 'ramjet' motor** provides it with thrust all the way to the target intercept, and thus the largest 'No Escape Zone' of any air-to-air missile system.

**European multinational MBDA**

**Beyond Visual Range**

**Air-to-Air**

**Ramjet**

**Target intercept → → no escape zone**

**effective in dense electronic-warfare environments**

**BRAHMOS:** These supersonic cruise missiles, which have been operationalised in all three defence services, are built by BrahMos Aerospace, a joint venture between India's Defence Research and Development Organisation (DRDO) and Russia's NPO Mashinostroyeniya.

BrahMos missiles operate at close to Mach 3 speed in the cruise phase, which ensures reduced flight time, lower dispersion of targets, and quicker engagement time and non-interception.

The missile operates on a 'Fire and Forget Principle', adopting varieties of flights on its way to the target. As per its website, cruising altitude could be up to 15 km and terminal altitude as low as 10 metres. The missile carries a conventional warhead weighing 200-300 kg.

The range of some BrahMos missiles for land and ship attacks have been nearly doubled in recent years.

**DRDO + Russia**

**Supersonic cruise missile**

**Long range**

**Ramjet**

**Fire and Forget**

**Carry → conventional warhead**

**operationalised in all three defence services,**

**LOITERING MUNITIONS:** They are used for surveillance and identification of targets, and can carry out precision strikes, autonomously or otherwise. The Armed Forces in the last few years have been procuring a range of drones, including loitering munitions.

for surveillance and identification of targets  
can carry out precision strikes, autonomously or otherwise

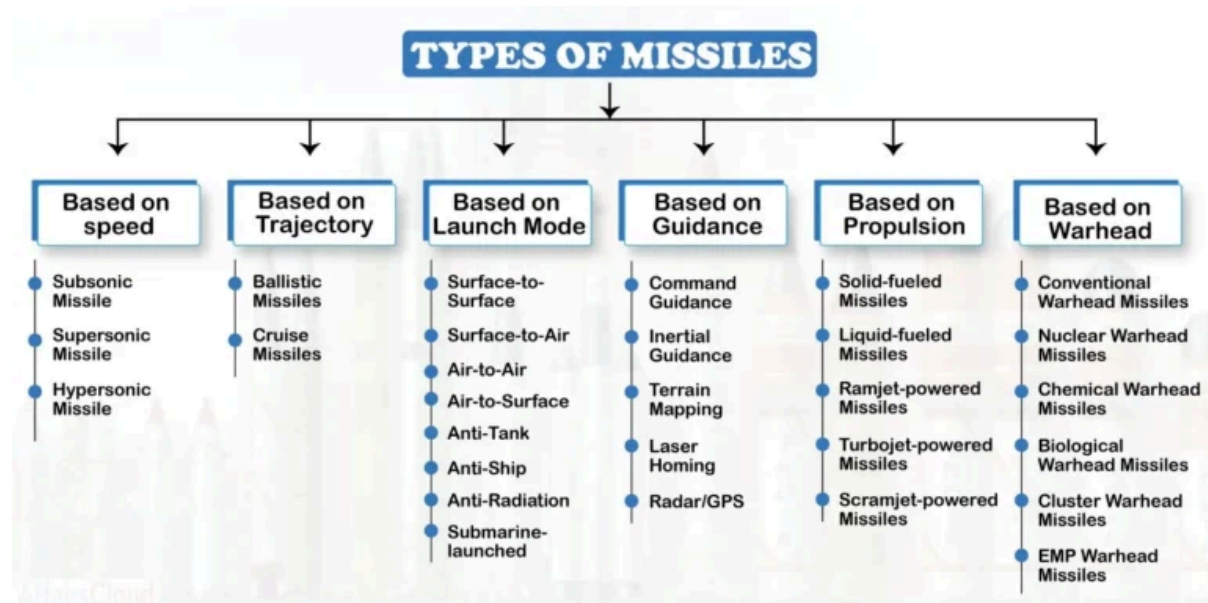


Table 1 – Key characteristics of ballistic and cruise missiles

| Characteristics | Ballistic missiles                                                | Cruise missiles                                                |
|-----------------|-------------------------------------------------------------------|----------------------------------------------------------------|
| Range           | From low to very high<br><i>Up to 15 000 km</i>                   | Mostly around 1 000 km<br><i>Up to 4 000 km</i>                |
| Altitude        | High<br><i>Easily detectable</i>                                  | Low<br><i>Hard to detect</i>                                   |
| Precision       | Low – around a few hundred metres<br><i>Fit for large targets</i> | High – a few metres<br><i>Fit for small and mobile targets</i> |
| Speed           | Up to 25 000 km/h at impact<br><i>Very hard to intercept</i>      | Around 1 000 km/h<br><i>Possibility to intercept</i>           |

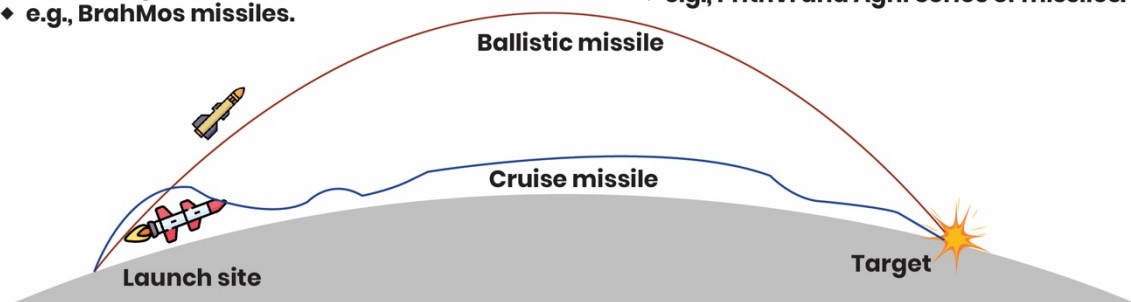
Data source: EPRS.

## Cruise Missiles

- ◆ Powered by jet engines **for continuous** flight throughout their journey.
- ◆ **Flies at relatively low altitudes**, often terrain-hugging contours with high manoeuvrability.
- ◆ Typically have **shorter ranges** but can loiter or change course more easily.
- ◆ Often use a **combination of GPS, inertial guidance and terrain-contour matching** for navigation.
- ◆ Usually **carry smaller, single warheads** (conventional or nuclear).
- ◆ **Harder to detect but easier to intercept** after detection.
- ◆ e.g., BrahMos missiles.

## Ballistic Missiles

- ◆ **Rocket-powered for initial boost phase**, then coast unpowered for most of their flight.
- ◆ **Follows a ballistic trajectory**, arcing upward into the atmosphere before descending to their target.
- ◆ Generally have **longer ranges** and higher top speeds.
- ◆ **Mainly rely on inertial guidance** and sometimes GPS.
- ◆ Can carry **larger payloads**, including multiple warheads.
- ◆ **Easier to detect early but harder to intercept** due to their speed
- ◆ e.g., Prithvi and Agni Series of missiles.



**09.05.2025**

# India counters Pak attacks on west and north fronts, long night in over 15 cities

DRONES, MISSILES TARGET JAMMU, PATHANKOT, UDHAMPUR

HEAVY EXCHANGE OF ARTILLERY IN AKHNOOR, RAJOURI, POONCH

PAK BID TO ATTACK JAISALMER, BIKANER DISTRICTS FOILED



## How Air Defence Systems work

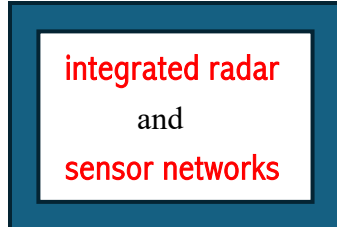
Key to India's thwarting of Pakistani aerial attacks along the western border has been the success of Indian air defences. These are complex military hardware-software systems that work to take out threats such as enemy aircraft, unmanned drones, or missiles before they can cause any damage. Here's what air defence systems constitute, and why they are critical to modern warfare

- ▽ **Indian Army** air defence units responded using a range of weapon systems, including
  - L-70 guns,
  - Zu-23mm guns,
  - Schilka systems, and
  - specialized counter-drone technology.
- ▽ These systems were deployed in key sectors such as  
Udhampur, Samba, Jammu, Akhnoor, Nagrota, and Pathankot.

## What are air defence systems?

▽ Air defence systems are multi-layered military platforms designed to → → **detect and destroy** → → **aerial threats** such as **drones, helicopters, aircraft, and missiles.**

→ These systems operate through



that identify incoming threats **in real time.**

|                                   |                                                               |                                                                       |
|-----------------------------------|---------------------------------------------------------------|-----------------------------------------------------------------------|
| At the <i>core</i> of air defence | are <i>radar units</i> ,                                      | which <i>scan the skies</i><br>and<br><i>detect hostile movement.</i> |
| These are <i>supported by</i>     | <i>early warning systems</i><br>and<br><i>command centres</i> | that <i>process data</i><br>and<br><i>issue response commands.</i>    |

Surface-to-air missiles (SAMs),  
which vary in range and capability,  
are launched to neutralise threats.

Many of these systems  
are mounted on  
**mobile platforms**,  
allowing for rapid deployment  
across different locations.



| Long-Range Defence                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              | Medium-Range Defence                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |                            | Short-Range Defence                                                                                                                                                                                                                                                                                                                                                                                                                                                  |                         |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------|
| <b>S-400</b><br>(380 km)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | <b>Barak-8</b><br>(70-80 km)                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | <b>Akash</b><br>(25-40 km) | <b>SPYDER</b><br>(15 km)                                                                                                                                                                                                                                                                                                                                                                                                                                             | <b>Igla-S</b><br>(6 km) |
| <p><b>S-400 Triumph,</b></p> <ul style="list-style-type: none"> <li>- acquired from <b>Russia,</b></li> <li>- is a long-range</li> <li>- capable of targeting threats up to 380 km away.</li> <li>- <b>surface-to-air missile</b> system</li> <li>- India has deployed three squadrons of the S-400, with two more expected by 2026 (delayed due to the Russia-Ukraine war).</li> <li>- This system forms the backbone of India's strategic air defence, offering <b>protection against a variety of aerial threats.</b></li> <li>- Called <b>"Sudarshan Chakra"</b></li> </ul> | <p><b>Barak-8,</b></p> <ul style="list-style-type: none"> <li>- developed jointly by <b>India and Israel,</b></li> <li>- is a medium-range</li> <li>- with a range of 70–80 km.</li> <li>- <b>surface-to-air missile</b> system</li> <li>- It is deployed by the Indian Air Force, Army, and Navy <b>to counter aircraft, helicopters, and UAVs.</b></li> </ul> <div style="border: 1px solid black; padding: 5px; margin: 10px auto; width: fit-content;"> Airforce<br/>Army<br/>Navy </div> |                            | <p><b>SPYDER system,</b></p> <ul style="list-style-type: none"> <li>- sourced from <b>Israel,</b></li> <li>- is a short-range</li> <li>- with a range of up to 15 km.</li> <li>- <b>surface-to-air missile</b> system</li> <li>- It is designed <b>for quick reaction</b> and is deployed by the Indian Air Force and Army.</li> </ul> <div style="border: 1px solid black; padding: 5px; margin: 10px auto; width: fit-content;"> Airforce<br/>Army<br/>Navy </div> |                         |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | <p><u><b>Indigenous</b></u></p> <p><b>Akash missile system,</b></p> <ul style="list-style-type: none"> <li>- has a range of 25–40 km.</li> <li>- It is used by both the Indian Air Force and Army for defending against aerial threats.</li> </ul>                                                                                                                                                                                                                                            |                            | <p><u><b>Russia</b></u></p> <p><b>Igla-S (6 km)</b></p> <ul style="list-style-type: none"> <li>- is a man-portable air defence system</li> <li>- with a range of 6 km.</li> <li>- It is used for close-range defence</li> <li>- against low-flying aircraft and helicopters.</li> </ul>                                                                                                                                                                              |                         |

|  |                                                                                                                           |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|--|---------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|  | <div style="border: 1px solid blue; padding: 5px; width: fit-content; margin: 0 auto;"> Airforce<br/>Army<br/>Navy </div> | <b>Igla-1M</b> (5 km)<br><b>OSA-AK-M</b> (10 km)<br><b>Pechora missiles</b><br><br><hr style="border-top: 1px dashed green;"/><br><u><b>Sweden</b></u><br><b>upgraded L-70 guns</b><br>(3.5 km).<br><ul style="list-style-type: none"> <li>- Developed originally by Sweden's Bofors and <b>now manufactured in India under licence,</b></li> <li>- the L-70 40mm gun has been significantly upgraded with <ul style="list-style-type: none"> <li>◦ radar,</li> <li>◦ electro-optical sensors,</li> <li>◦ auto-tracking systems.</li> </ul> </li> </ul> |
|--|---------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

### India's Integrated Air Defence Network

| Consist of                                                                                                                                                                              | How does it operate?                                                                                                                                                    |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| India's air defence systems<br><br>are <b>integrated</b> through the<br><br>Air Defence<br>Ground Environment System ( <b>ADGES</b> )<br>and<br>Base Air Defence Zones ( <b>BADZ</b> ). | These networks provide<br><br><b>wide-area radar coverage</b><br>and<br><b>coordinate the deployment of missile systems</b><br><br>to protect vital assets and regions. |

This multi-tiered approach ensures that India can effectively **detect, track, and neutralize** a wide range of aerial threats, maintaining the security of its airspace.

## Pakistan's Air Defence capability

| Consist of                             | How does it operate?                                                                            |
|----------------------------------------|-------------------------------------------------------------------------------------------------|
| Chinese-supplied <b>HQ-9 systems</b> , | with a base range of <b>120 km</b> that can extend up to <b>300 km</b> in newer versions        |
| French <b>Spada system</b> ,           | which has a <b>20–25 km range</b> and is used to protect airbases and other critical locations. |

## ALL ABOUT IAI HAROP: LOITERING MUNITION THAT INDIA USED TO STRIKE PAK

It is understood that India deployed Israeli-made IAI HAROP drones against Pakistani air defence systems on Thursday

### LOITERING MUNITION

Developed by the Israel Aerospace Industries, the HAROP is a loitering munition that combines characteristics of a typical unmanned aerial vehicle (UAV) and a missile.

Equipped with an explosive payload, loitering munitions are meant to linger in the air — the HAROP has an endurance of over nine hours — before identifying and crashing into a specific target. Such a mode of operation has earned these weapons the monicker of "suicide" or "kamikaze" drones.

The advantage of loitering munitions like the HAROP is that they can be launched without having to pre-identify targets, unlike older precision-guided weapons that require exact coordinates before being launched. The drone's camera allows the operator to visually scan an area, and zero in on a target that is strategically most valuable.

"Independent of real-time intelligence, HAROP is uniquely capable



The IAI HAROP is among the most feared loitering munitions in the world. IAI

against time-critical, high-value, relocatable targets," the IAI's brochure on the weapon states.

Note that the HAROP can function autonomously, or with a remotely located operator. It loiters in a designated area, and upon locating a target, plans an attack route and pursues it from any direction, either in a shallow or a steep dive.

Notably, the HAROP is resilient against Electronic Warfare (EW), and immune from Global Navigation Satellite System (GNSS) jamming.

### SUCCESSOR OF HARPY

The IAI has been a fore-runner in the development of loitering munitions. In the 1980s, it introduced the HARPY, a "fire and forget" missile that could be launched without prior intelligence towards the general direction of the target, stay in the air, and then zero in on the target. The HARPY was specifically optimised for Suppression of Enemy Air Defenses (SEAD) operations.

The newer HAROP, which evolved from the HARPY, carries an electro-optical sensor instead of the Radio

Frequency (RF) seeker of the HARPY. This provides for much improved targeting performance.

"Once the wide-area scan spots an activity, the electro-optical sensor is quickly pointed in this direction to identify and acquire the target. Once a positive acquisition is made, the loitering sensor transforms into a guided weapon, ready to attack the target it has just revealed," the IAI's website states.

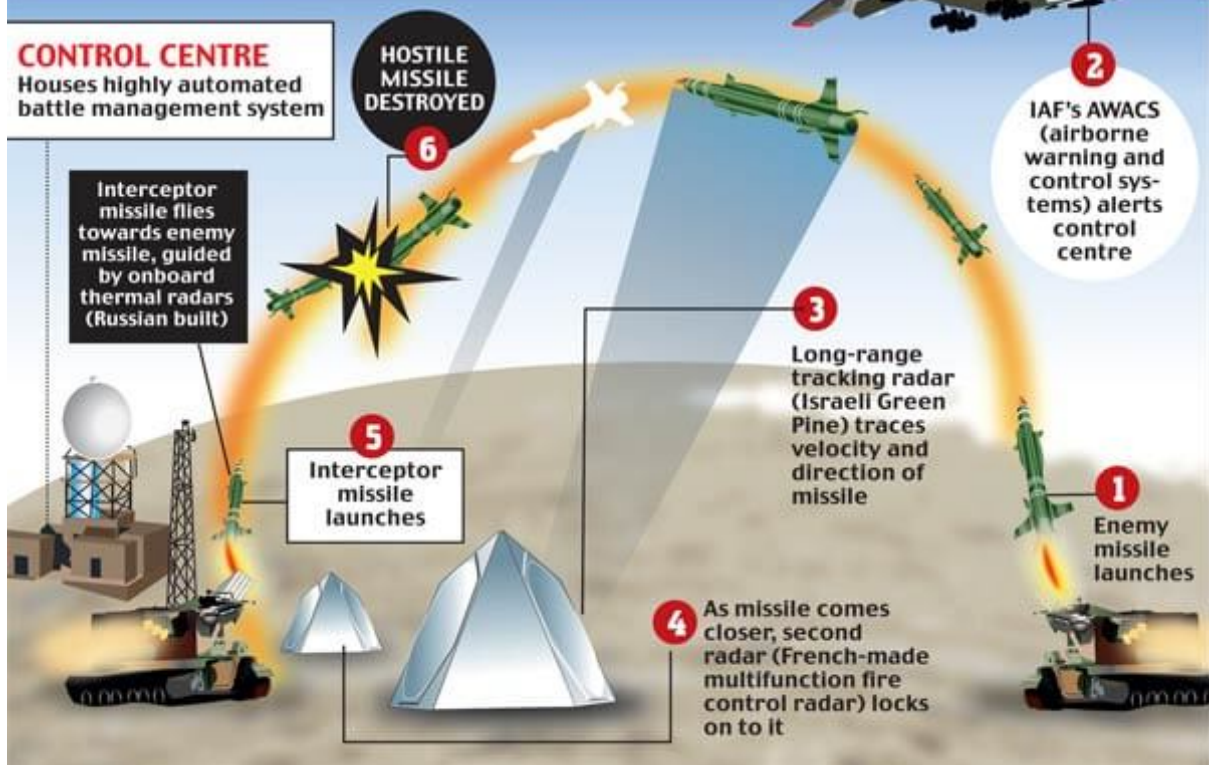
The IAI claims that hundreds of battle-tested HAROP loitering munitions have proved highly effective in combat, "delivering 98% of mission success."

The HAROP today is deployed to hunt high-value targets like unmanned surface vessels, command posts, supply depots, tanks, and air defense systems. It is launched from canisters mounted on trucks or naval vessels, and can be deployed from diverse terrains and environments.

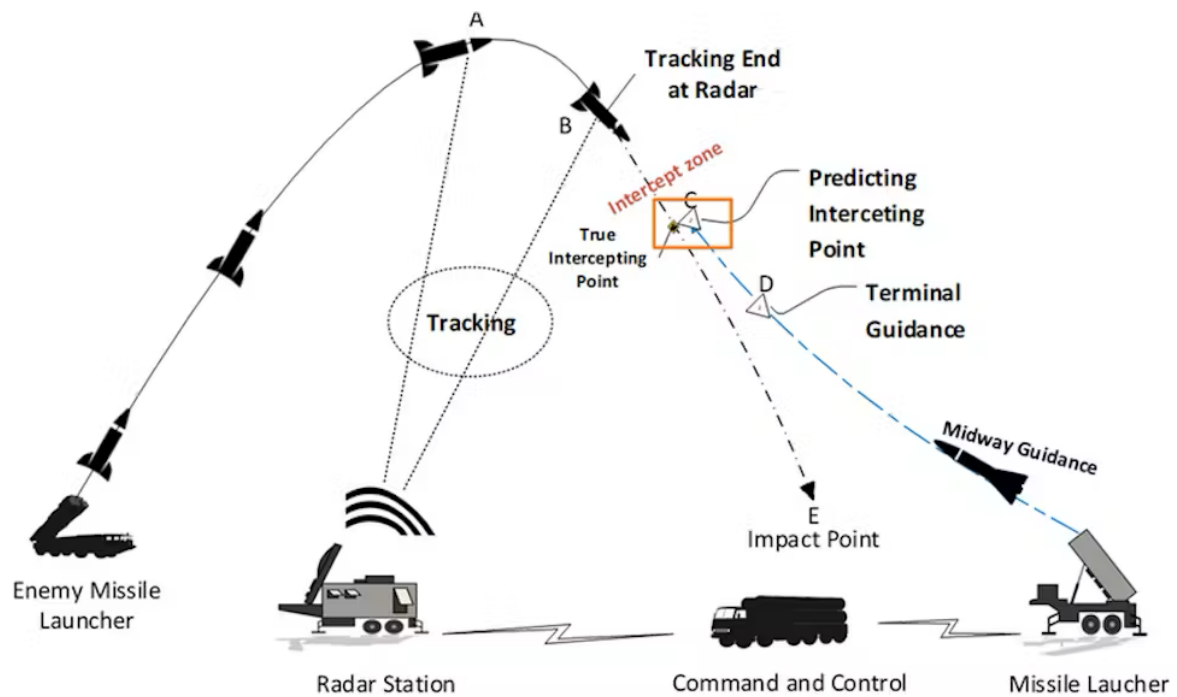
EXPRESS NEWS SERVICE

## HOW INDIA'S MISSILE DEFENCE WILL WORK

But as of now despite DRDO's claims, it is only a technology demonstrator programme with many critical elements yet to be proved. An expert has termed DRDO's claims as jingoistic kite-flying







**Ballistic Missile Defense System**

## DESI & VIDESHI MISSILE SHIELDS

**1. Akash**  
Indigenous area defence missile system  
**RANGE: 25 KM**

- > IAF inducting 15 squadrons of Akash-1 & two systems for Rs 10,900 crore
- > Army has inducted 2 regiments for Rs 14,180cr (Two more Akash-2 regiments from Dec 2018 onwards)

**2. S-400 Triumph**  
Rs 39,000-crore deal with Russia to be inked this year  
**RANGE: 400 KM**

- > 1st missile unit in 24 months after contract. All 5 in 54 months
- > China inducting S-400 batteries under \$3 billion inked in 2014

**4. Barak-8**  
Joint DRDO-Israeli Aerospace Industries project  
**RANGE: 70-KM**

- > IAF to get initial nine medium-range SAM squadrons for Rs 10,076 crore
- > Navy to get it for its frontline warships for Rs 2,606 crore (initial cost)
- > 14 warships fitted with older Barak-1 systems (range 9 km)

**3. Spyder**  
Israeli low-level quick-reaction missile system  
**RANGE: 15 KM**

- > IAF inducting 4 Spyder systems
- > DRDO developing 30-km range QR-SAM system

**5. Ballistic Missile Defence**

- > Indigenous project to develop 2-tier BMD shield
- > Phase-I (interceptor missiles with 4.5 Mach speed) for 2,000-km range enemy missiles
- > Phase-2 (interceptor missiles with 6-7 Mach speed) for 5,000-km range missiles
- > Will take 2 years for Phase-I to be deployed

## BALLISTIC MISSILE DEFENCE

➤ Aim is to provide an effective **missile shield** against incoming enemy nuclear missiles

➤ A hostile missile needs to be intercepted at **boost** (launch) point, **mid-course** (flight through space), or **terminal** phase (during atmospheric descent)

### BMD systems usually consist of:

➤ Overlapping network of early-warning & tracking radars  
➤ Reliable command and control posts

➤ Land- & sea-based batteries of advanced interceptor missiles

Only handful of countries like **US, Russia, China & Israel** have effective BMD systems

But no system is **100% full-proof**



## THE INDIAN STORY

➤ Development of two-tier BMD system began in **late-1990s**

➤ An interceptor missile was **first tested in 2006**

➤ Since then, interceptor missiles tested around 10 times. At least **3 tests have failed**

➤ BMD system designed to track & destroy hostile missiles both inside (**endo**) & outside (**exo**) the earth's atmosphere

➤ But not yet tested in integrated mode, with both exo and endo interceptor missiles together

➤ **Phase-I** of BMD system geared towards tackling enemy missiles with a **2,000-km** range. **Phase-II** to enable interception of missiles in **5,000-km** range

➤ But long delay in becoming operational. DRDO had earlier promised the two-tier missile shield would be deployed in Delhi by 2014

## Indo-Pak conflict: Rupee posts biggest single-day loss in over two years

### DEPRECIATION OF OVER 1%

**THIS SIGNIFICANT** depreciation of over 1 per cent marks the rupee's worst day since February 6, 2023. The rupee had closed at 84.83 on Wednesday. The heightened tensions have led to a surge in risk aversion, impacting the currency markets and resulting in the rupee's sharp decline

**THE CURRENCY** market came under pressure after Pakistan attempted to target several Indian military sites using drones and missiles, a move thwarted by India's defence systems. Apart from the geopolitical stress, a stronger US dollar and rising crude oil prices further weighed in



# As Trump's tariff policies play out, the US Fed takes a longer pause

*Much will now depend on if, how quickly and to what extent trade deals are struck and tariffs are rolled back*

▽ **Actions of central banks around the world are increasingly diverging from those of the US Federal Reserve.**

| Actions of the Central Banks                                                                                                                                                                                                                                                                                                                                       | vs                                        | US Federal Reserve                                                                                                                                                                                                                                                                                                |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p>In April, the <b>European Central Bank</b> had cut interest rates as it noted that "<u>the outlook for growth has deteriorated owing to rising trade tensions</u>".</p> <p>A few days prior to that, the <b>RBI's</b> monetary policy committee had lowered rates in India.</p> <p>And on Thursday, the <b>Bank of England</b> also reduced interest rates.</p> | <p><u>Context</u><br/>Policy rate cut</p> | <p>In comparison, in its May meeting,</p> <p>the US Fed has kept rates <b>unchanged</b></p> <p>for the <b>third straight time</b>,</p> <p>maintaining the federal funds rate in the <b>4.25-4.5 per cent range</b>,</p> <p>as it noted that the <b>risks of higher unemployment and inflation</b> have risen.</p> |

▽ **Trump's Tariffs and future policy prediction dilemma for Fed**

The **implications** of US President Donald Trump's tariffs, which are "**significantly larger than anticipated**", are clear.

→ As Fed Chairman Jerome Powell noted, "if the large increases in tariffs announced are sustained, they are likely to generate

- a rise in inflation,
- a slowdown in economic growth and
- an increase in unemployment”.

→ But, at the current juncture, the **Fed’s next steps are difficult to predict.**

- In fact, Powell has also acknowledged that, saying that “**it’s really not at all clear what it is we should do**”.

## ▽ Economic health of US at present

| <b>GDP contraction because of surged import</b>                                                                                                                                          | <b>Inflation maintaining stability but personal consumption expenditures price index is has been lowering consecutively</b>                                                                                          | <b>Labour market healthy ( non-farm payroll rose, unemployment rate unchanged)</b>                                                                                                                    | <b>Powell’s observation @ healthy</b>                                                                                                                                                          |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| US GDP contracted by 0.3 per cent at an annualised rate in the first quarter of 2025 as imports surged by 41.3 per cent with consumers and firms trying to get ahead of Trump’s tariffs. | Inflation, though, has remained in the 2.5 per cent to 3 per cent range for several months now — the personal consumption expenditures price index was at 2.3 per cent in March, down from 2.7 per cent in February. | The labour market also remains healthy. As per the US Bureau of Labor, non-farm payroll rose by 1,77,000 in April, surpassing expectations. The unemployment rate remained unchanged at 4.2 per cent. | Powell has also noted that the US economy appeared healthy, and has said that <b>(the effect) “just hasn’t shown up yet”</b> . <b><u>This provides the central bank the space to wait.</u></b> |

## ▽ Look and watch to determine policy

Higher tariffs will derail the economic momentum. There are already some indications of a souring of sentiment. Much will now depend on if, how quickly and to what extent trade deals are struck and tariffs are rolled back.

## Trump renews criticism of Fed's Powell

*Washington:* US President Donald Trump renewed his criticism on Thursday of Federal Reserve Chair Jerome Powell, complaining the Fed is refusing to lower interest rates.

Trump said cutting interest rates would be “like jet fuel” for the economy “but he doesn’t want to do it.” He said Powell is “not in love with me.”

The Fed this week kept short-term borrowing costs in the 4.25 per cent–4.50 per cent range. While tariffs are likely to increase both inflation and unemployment, the economy so far has shown little sign of either, Powell said. **REUTERS**

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**10.05.2025**

### **What are Turkish Songar drones, used by Pak to attack India?**

- **Designed and manufactured** by Turkey-based defence company **Asisguard**,
  - Songar drones were **first launched** in April **2019**, and
  - **delivered to** the Turkish Armed Forces (**TAF**) after successful completion of their testing in February **2020**
- 
- Pakistan’s attempted drone incursion in 36 military and civilian sites between the intervening night of Thursday (May 8) and Friday (May 9) likely involved Turkish-made Asisguard Songar drones, India said on Friday.

| Design                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          | Features                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <ul style="list-style-type: none"> <li>- has a width of 140 cm from rotor to rotor, and</li> <li>- a <b>maximum take-off weight of 45 kg.</b></li> <li>- has the <b>ability to perform 35 minutes of duty → → without a payload.</b></li> <li>- consists of a <b>pilot camera</b> for surveillance and exploration purposes, and a <b>gun-mounted camera.</b></li> <li>- use both Global Positioning System (<b>GPS</b>) and <b>GLONASS navigation systems</b> for communications during operations.</li> </ul> | <ul style="list-style-type: none"> <li>- The <b>portable unmanned aerial system (UAS)</b></li> <li>- <b>broadcasts real-time video</b>, and</li> <li>- <b>operates</b> within a radius of <b>up to 5 km.</b></li> <li>- It can ascend to an altitude of up to <b>3,000 m above mean sea level</b> and <b>300 m above ground level.</b></li> <li>- The drone can be used for <b>both day and night</b> military operations.</li> <li>- The drone comes with <b>autonomous and manual flight control modes.</b></li> <li>- It also comprises <b>features such as returning home in case there is a loss of connection between the drone and its remote controller.</b></li> </ul> |

## The armaments

There are different types of Songar drone systems based on the weapons they feature.

The website of Asisguard lists **five types of Songar drones:**

- ☐ Songar 5.56 x 45 mm **Assault Rifle**,
- ☐ Songar 2×40 mm **Grenade Launcher**,
- ☐ Songar 6×40 mm **Drum Type Grenade Launcher**,
- ☐ Songar 3×81 mm **Mortar Gripper**,
- ☐ Songar 8 x **Tear/Smoke Grenade Launcher.**

## Performance

- ✓ Songar drones are **designed for coordinated attacks** with other military assets, such as troops or other drones.
- It also offers **versatility during land, maritime and special operations**.
  - ✓ The **UAS can be deployed stealthily**, allowing forces to launch a **surprise attack** without revealing their location or presence.
  - ✓ The drones can be used for **reconnaissance and surveillance**, providing **real-time intelligence** on enemy movements.

**11.05.2025**

# CEASEFIRE...

After most intense fighting since Kargil, set off by the Pahalgam terror attack, India and Pakistan announce end to military action — but Islamabad's intentions pose the test



**AFTER LONG NIGHT OF TALKS MEDIATED BY U.S.... INDIA, PAKISTAN HAVE AGREED TO A FULL AND IMMEDIATE CEASEFIRE**  
U.S. PRESIDENT DONALD TRUMP



**INDIA HAS CONSISTENTLY MAINTAINED UNCOMPROMISING STANCE AGAINST TERRORISM... WILL CONTINUE TO DO SO**  
EXTERNAL AFFAIRS MINISTER S. JAISHANKAR



**PAKISTAN APPRECIATES THE U.S. FOR FACILITATING THIS... WE HAVE ACCEPTED IN INTEREST OF REGIONAL PEACE**  
PAK PRIME MINISTER SHEHBAZ SHARIF

**13.05.2025**

PRIME MINISTER NARENDRA MODI'S FIRST ADDRESS TO THE NATION SINCE OPERATION SINDOOR

**'India won't accept Pak nuclear blackmail... I dedicate our soldiers' valour to every mother, sister, daughter'**

## India's New Doctrine on Terrorism:-

**IF THERE IS**  
a terrorist attack on  
India, a fitting reply  
will be given

**INDIA WILL NOT**  
tolerate any nuclear  
blackmail. Will  
strike precisely,  
decisively

**WE WILL NOT**  
differentiate  
between the  
government  
sponsoring  
terrorism and the  
masterminds of  
terrorism

▽ After Operation Sindoor, the most intense military campaign since Kargil, Indian PM delineated India's new doctrine against terrorism resting on three key elements :

- 1) A response on India's terms;
  - 2) no tolerance for terror that hides under "nuclear blackmail"; and
  - 3) no distinction between the terrorists, their leaders and a government that sponsors them.
-



# Why US & China have agreed to temporarily slash tariffs

## THE TRADE WAR BETWEEN US & CHINA

**FEB 1:** Trump imposes 10% tariffs on China, 25% on Mexico and Canada, citing fentanyl crisis

**FEB 4:** As tariffs on China take effect, Beijing puts 15% tariffs on US coal, LNG; 10% on crude

**MAR 4:** Another 10% US tariffs; total now 20%. China responds with up to 15% on key US farm products

**APR 2:** On "Liberation Day" Trump announces 34% on all Chinese goods from April 9

**APR 4:** China announces its own 34% effective April 10, as well as controls on rare earths exports

**APR 7:** Trump threatens additional 50% tariffs if China doesn't back down

**APR 9-10:** The US levies 84% additional tariffs, bringing the total to 104%. China retaliates with 84% tariffs, effective April 10. Trump then raises it to 125%, totalling 145%.

**APR 11:** China raises tariffs to 125%, effective Apr 12, and declares no further hikes

**APR 13:** Trump exempts smartphones, computers and other electronics, subjecting them only to a 20% tariff

**MAY 6:** Talks in Geneva announced

## What were the tariffs until now?

- ▽ *Since February 1*, US President Donald Trump has imposed tariffs on China for a variety of reasons.

| USA                                                                                                                                                                                                                                               | China                                                                      |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------|
| On February 1, the <b>first lot</b> of tariffs <b>(10%)</b> was for the <b>sale of fentanyl</b> , <b>an opioid</b> (67% of death caused by opioid due to fentanyl) <b>that is responsible for thousands of deaths due to overdose in the US</b> . | China responded with its own counter-tariffs, unlike most other countries. |
| On April 2, which Trump designated as " <b>Liberation Day</b> ", Washington imposed an <b>additional 34% tariffs</b> on China.                                                                                                                    |                                                                            |
| By April 10, the tariffs had reached a prohibitive level.                                                                                                                                                                                         | China had responded with <b>125% tariffs</b> on US imports.                |
| The US had imposed <b>145% tariffs</b> on China, and                                                                                                                                                                                              |                                                                            |

At this 145% rate,

the price of an **\$100 worth Chinese goods** in the US  
would rise **to** an eye-watering **\$245**.

In addition to tariffs,

China also imposed some **non-tariff barriers** on the US, such as

- export restrictions on rare earth minerals, and
- restrictions/investigations against multiple US companies.

### What is the situation now?

▽ After the truce, the **base tariff rates** have fallen to **10% for both countries**.

→ However, the US continues to levy a 20% tariff on account of fentanyl smuggling.

▽ So effectively,

|                                                                     |                                                                  |
|---------------------------------------------------------------------|------------------------------------------------------------------|
| consumers in the US now face a tariff of 30% on imports from China, | consumers in China face a tariff of 10% for imports from the US. |
|---------------------------------------------------------------------|------------------------------------------------------------------|

▽ China has also suspended the non-tariff barriers it installed after April 2.

**14.05.2025**

# India's air defence shield

IAF's Integrated Air Command and Control System (IACCS) is an automated command and control system that integrates data from all air defence assets to detect, identify, intercept, and destroy hostile intruders

## ▽ Air defence systems use

- a complex system or radar,
- control centres,
- defensive fighter jets, and
- ground-based air defence missile,
- artillery, and
- electronic warfare systems

to neutralize a range of threats from the sky, including enemy aircraft, drones, and missiles.

## The IAF'S IACCS

- **Developed by** the public sector aerospace and defence electronics company **Bharat Electronics Limited (BEL)**, IACCS is

an **automated** → → **command and control** system

that integrates data

from all air defence assets, including

- ground-based radar,
- air bone sensors,
- civilian radar,
- communications nodes, and
- the various command and control centres of the IAF.

|                                                                                                           |                                                                          |                                                                     |
|-----------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------|---------------------------------------------------------------------|
| The availability of the <b>consolidated dataset</b> ,<br><br>along with<br><br><b>real-time updates</b> , | <b>provides</b> military commanders at multiple levels<br><br><br>with a | so that they can <b>respond to a wide range of aerial threats</b> . |
|-----------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------|---------------------------------------------------------------------|

|  |                                                                                                                          |  |
|--|--------------------------------------------------------------------------------------------------------------------------|--|
|  | <p><b>comprehensive picture</b></p> <p>and</p> <p><b>overall situational awareness</b></p> <p>during air operations,</p> |  |
|--|--------------------------------------------------------------------------------------------------------------------------|--|

|                                                     |                                                                                            |                            |                                                                                                                                                                                                   |
|-----------------------------------------------------|--------------------------------------------------------------------------------------------|----------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| The <b>total battlefield picture</b> <i>enables</i> | <p><b>central control</b> and <b>decentralised execution</b></p> <p>at various levels.</p> | By reducing reaction time, | <p>it allows military commanders to</p> <p><b>make early decisions on identification and assessment of threats,</b></p> <p>and</p> <p><b>to direct air defence assets to carry out kills.</b></p> |
|-----------------------------------------------------|--------------------------------------------------------------------------------------------|----------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

|                                                                                   |                                                                            |
|-----------------------------------------------------------------------------------|----------------------------------------------------------------------------|
| The <b>overlapping radar and radio data coverage</b> of the IACCS <i>helps in</i> | <p><b>effective airspace management</b> and <b>reduces redundancy.</b></p> |
|-----------------------------------------------------------------------------------|----------------------------------------------------------------------------|

## The **ARMY'S** AKASHTEER

- The Indian Army has a similar air defence control and reporting system called **Akashteer**, which connects the units of its air defence.

| Developed by                                                                                                                                                                                     | Characteristics                                                                                                                                                                   | Present status                                                                                                                                                                                                                                                                |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Akashteer too has been developed by <b>BEL</b> , with which the Ministry of Defence signed a Rs, 1982 crore contract in March <b>2023</b> , according to an official release issued at the time. | Akashteer would enable the <b>monitoring of low-level air space</b> over battle areas, and <b>effectively control ground based air defence weapon systems</b> , the release said. | <input type="checkbox"/> Akashteer <b>operates at a comparatively small scale</b> at present.<br><input type="checkbox"/> It is <b>in the process of being integrated with IACCS</b> for effective coordination between <b>the Army and Air force</b> air defence operations. |

## MULTI - LAYERED UMBRELLA

- The air defence assets of the Indian military are deployed in a multi-layered system.

| Four Layers                                            |                                             |  |  |  |                                                     |
|--------------------------------------------------------|---------------------------------------------|--|--|--|-----------------------------------------------------|
| 1 <sup>st</sup>                                        | 2 <sup>nd</sup> + 3 <sup>rd</sup>           |  |  |  | 4 <sup>th</sup>                                     |
| The first layer comprised<br><br>counter-drone systems | while the second and third layers comprised |  |  |  | The fourth layer of the grid comprised<br><br>long- |
|                                                        | point air defence                           |  |  |  |                                                     |

|                                                                   |                                                                                                                                                                                                                                                                                                                                                                                                   |                                                             |                                                               |                                                                            |                                                    |
|-------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------|---------------------------------------------------------------|----------------------------------------------------------------------------|----------------------------------------------------|
| and<br><b>MANPADS</b><br>(Man portable<br>Air Defence<br>Systems) |                                                                                                                                                                                                                                                                                                                                                                                                   | <b>short-<br/>range<br/>surface-<br/>to-air<br/>defence</b> | <b>medium-<br/>range<br/>surface-<br/>to-air<br/>missiles</b> | <b>medium-<br/>range<br/>surface-to-<br/>air missiles</b><br>respectively. | <b>range<br/>surface-<br/>to-air<br/>missiles.</b> |
|                                                                   | <p><u><b>Point<br/>defence<br/>comprises</b></u></p> <p>low-level<br/>air<br/>defence<br/>guns<br/>+<br/>shoulder-<br/>fired<br/>weapons,</p> <hr style="border-top: 1px dashed red;"/> <p style="text-align: center;">+</p> <hr style="border-top: 1px dashed red;"/> <p><u><b>aerial<br/>defence<br/>comprises</b></u></p> <p>fighter air<br/>craft<br/>+<br/>long-<br/>range<br/>missiles.</p> |                                                             |                                                               |                                                                            |                                                    |

A **range of surveillance radar** forms part of the air defence grid.

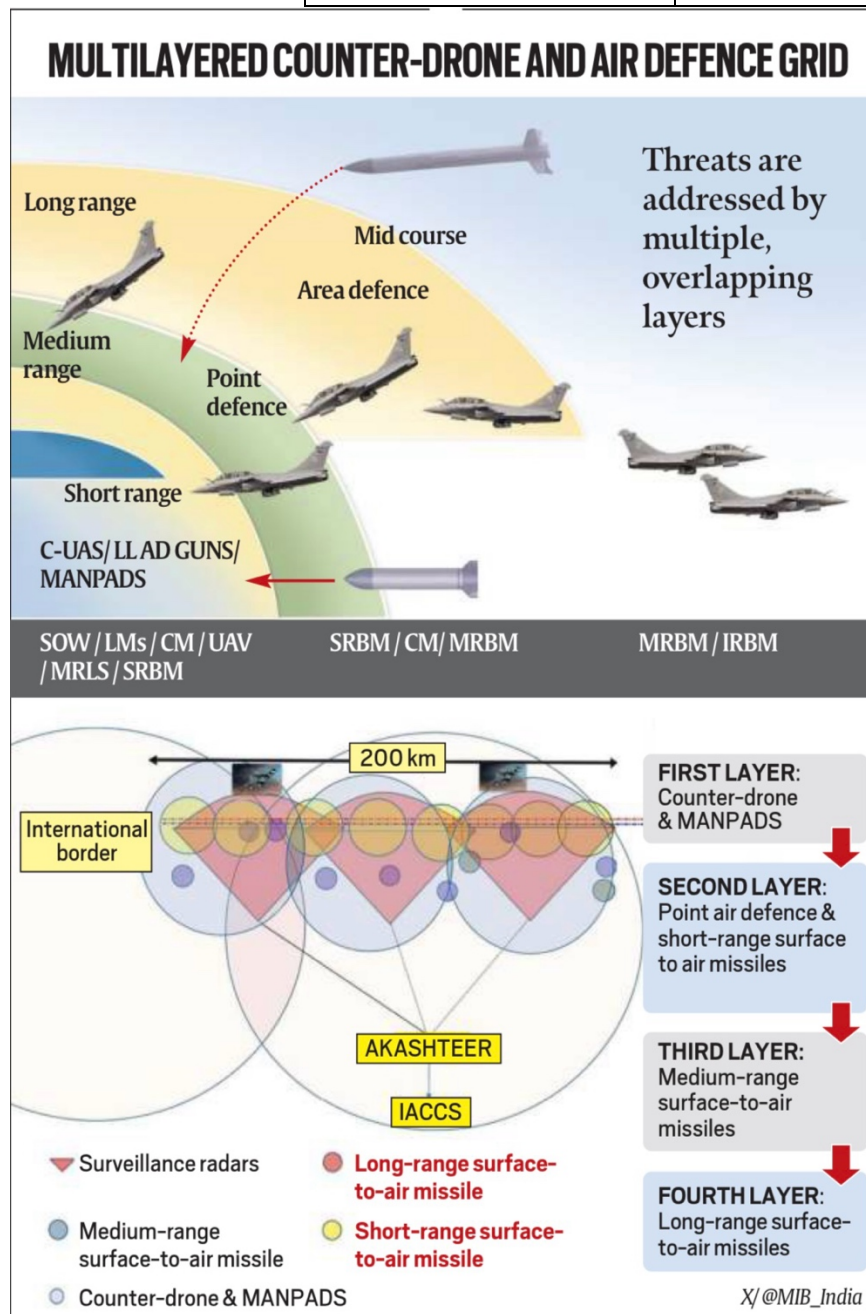
These radars play a key role in the **detection, identification, interception and destruction** of hostile intruders.

The **modern radars** of the IAF – **both**

**ground radar**



|                                       |                                                                                                                                              |
|---------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------|
| are <b>networked into the IACCS</b> . | air based <b>AWACS</b><br>(Airborne Warning and Control Systems)<br><i>and</i><br><b>AEW&amp;C</b> (Airborne Early Warning & Control) System |
|---------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------|



## IACCS in FUTURE

⇒ Over the past several years, the IAF has significantly enhanced its air defence efforts across all sensitive bases,

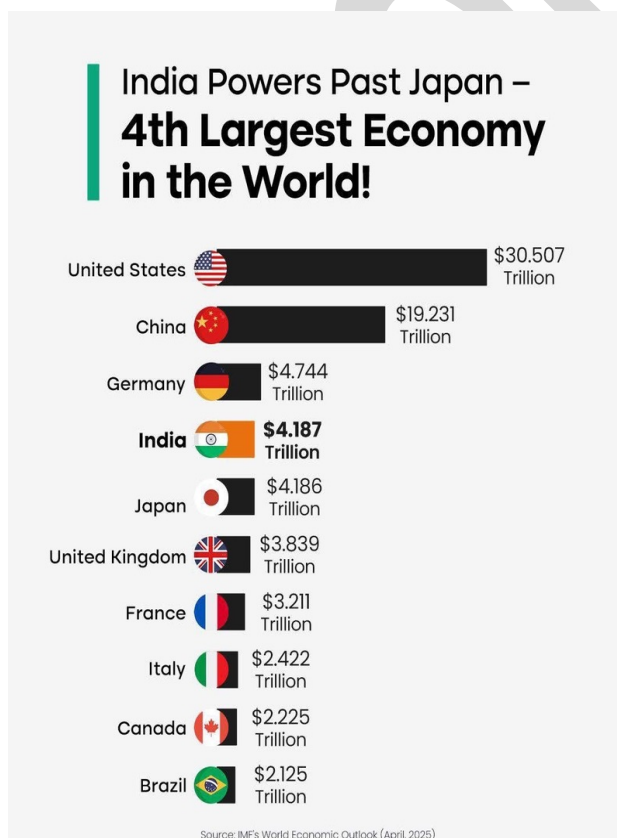
by increasing the

**radars**

|                                                           |                                                     |
|-----------------------------------------------------------|-----------------------------------------------------|
| presence of                                               | and                                                 |
|                                                           | <i>Surface to Air Guided Weapon (SAGW) systems,</i> |
| all of which have been integrated into the IACCS network. |                                                     |

- ⇒ As modern warfare grows more complex, **systems such as the IACCS will help achieve** the **critical integration** of all air defence assets to ensure **coordinated responses** from air defence platforms across the three Services.
- ⇒ It will also **fully incorporate emerging and cutting-edge technologies** such as **artificial intelligence** for the analysis of various threats in the future.

**15.05.2025**



## **IMF disburses \$1-bn tranche to Pakistan**

- ▽ The International Monetary Fund (IMF) has **disbursed a second tranche of \$1.023 billion under the Extended Fund Facility (EFF)** programme for Pakistan, the central bank said on Wednesday.
- ▽ The disbursement of the second tranche comes on a day when the IMF is holding virtual discussions on Pakistan's next budget as the visit of its mission to Islamabad was delayed due to security concerns in the region.
- ▽ With the transfer, the total disbursements stand at approximately **\$2.1 billion under the EFF of \$7 billion**, which was signed between Pakistan and the global lender last year.

### **KEY CONDITIONS**

- Increase Tax Revenues
- Phase Out Energy Subsidies
- Raise Utility Prices
- Privatize Loss-Making SOEs

 **Increase Tax Revenues** (especially through GST & fuel levies)

 **Phase Out Energy Subsidies**

 **Raise Utility Prices** (Electricity, gas rates increased again in May)

 **Privatize Loss-Making SOEs** (like PIA and Pakistan Steel)

 **Maintain Market-Based Exchange Rate**

## **Bangladesh to get \$1.3bn from IMF**

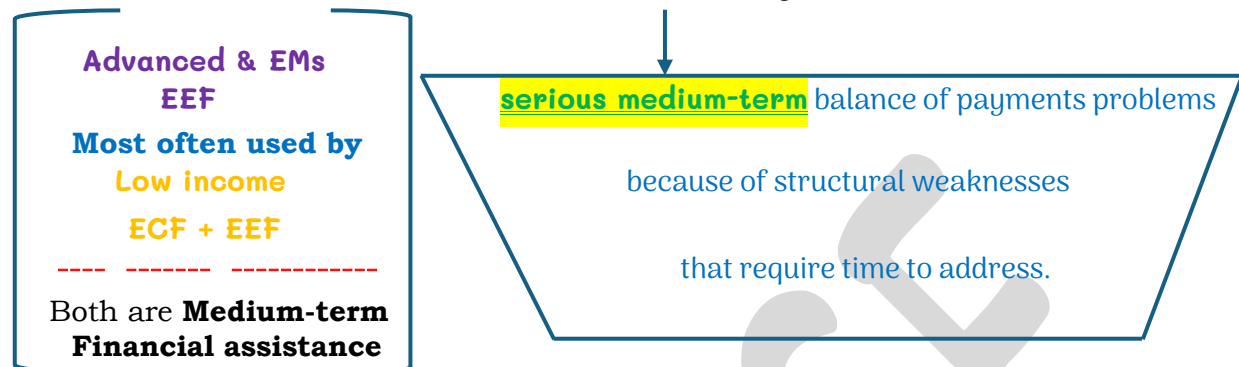
- ▽ IMF is set to release \$1.3 billion to Bangladesh in June, after completing a fourth review of its **\$4.7-billion loan programme** and a key breakthrough in talks on exchange rate reform.
- ▽ The funds, covering both the fourth and fifth tranches, had been held up as the IMF pressed for **greater exchange rate flexibility**, particularly the adoption of a crawling peg mechanism.

## Conceptual Knowledge:-

### Extended Fund Facility (EFF)

- The Extended Fund Facility (EFF) provides financial assistance

to countries facing



|                                                                    |                |                                                                        |
|--------------------------------------------------------------------|----------------|------------------------------------------------------------------------|
| To help countries implement <b>medium-term structural reforms,</b> | the EFF offers | <b>longer program engagement</b> and <b>a longer repayment period.</b> |
|--------------------------------------------------------------------|----------------|------------------------------------------------------------------------|

|                    |                                                                                                                                                                                                                                                            |
|--------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Purpose</b>     | Provide assistance to countries experiencing serious payment imbalances because of structural impediments or slow growth and an inherently weak balance-of-payments position.                                                                              |
|                    | Support comprehensive programs with a focus on policies needed to correct structural imbalances over an extended period.                                                                                                                                   |
| <b>Eligibility</b> | <p>All member countries facing actual or potential external financing needs.</p> <p>Most often used by advanced and emerging market countries, but low-income countries sometimes use the EFF together with the <u>Extended Credit Facility (ECF)</u>.</p> |

## Extended **Credit** Facility (ECF)

|                                    |                                                  |                                |                                                      |
|------------------------------------|--------------------------------------------------|--------------------------------|------------------------------------------------------|
| The Extended Credit Facility (ECF) | provides <b>medium-term financial assistance</b> | to low-income countries (LICs) | with <b>protracted</b> balance of payments problems. |
|------------------------------------|--------------------------------------------------|--------------------------------|------------------------------------------------------|

The ECF is one of the facilities under the **Poverty Reduction and Growth Trust (PRGT)**.

|             |                                                                                                                                                                                                                                                                    |  |
|-------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|
| Purpose     | Assist PRGT-eligible countries with a protracted balance of payments problem to implement economic programs that make significant progress toward a stable and sustainable macroeconomic position consistent with strong and durable poverty reduction and growth. |  |
|             | Help catalyze foreign aid.                                                                                                                                                                                                                                         |  |
| Eligibility | All PRGT-eligible countries facing a protracted balance of payments problem (resolution of underlying macroeconomic imbalances is expected to extend over the medium or longer term).                                                                              |  |

## **New monthly PLFS: Additional info on rent income, land possession, remittances**

- ▽ The first monthly bulletin of PLFS for April is scheduled to be released in May, while the first quarterly bulletin of PLFS covering both rural and urban areas for April-June is slated to be released in August.

First released April, **2017**

by **NSSO** under **MoSPI**

**At present,**

**rural** PLFS data

**urban** PLFS data

**Annual**

**Quarterly**

**Rural** PLFS  
+  
**Urban** PLFS

**Annual**

**From hence forth,**

**Rural** PLFS  
**Urban** PLFS

**Rural** PLFS  
+  
**Urban** PLFS

**Monthly**

**Quarterly**

- Quarterly bulletins provided details of labour force indicators such as LFPR, WPR, unemployment rate.
- Other employment surveys such as** the survey by the **Centre for Monitoring Indian Economy (CMIE)** comes out on a **weekly and monthly** basis.



Launched: 2017 (National Statistical Office)



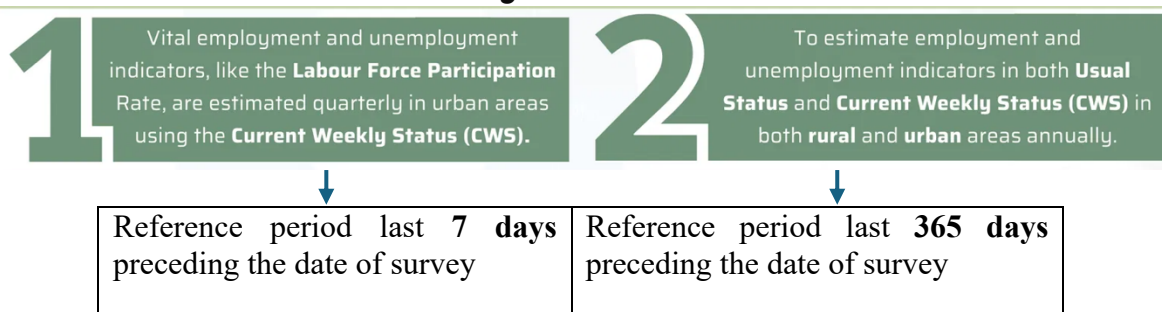
1st Report: 2019 (data from Jul 2017 - Jun 2018)

- The **Periodic Labour Force Survey (PLFS)** gives estimates of key **employment** and **unemployment** Indicators like the LFPR, WPR, UR, etc. These indicators, and 'Current Weekly Status' are defined as follows:

| Labour Force Participation Rate (LFPR) | Worker Population Ratio (WPR) | Unemployment Rate (UR)      | Current Weekly Status (CWS)                                              |
|----------------------------------------|-------------------------------|-----------------------------|--------------------------------------------------------------------------|
| % of People in the Labor Force         | % of Employed Person          | % of Persons Unemployed     | Based on the employment during the <b>last 7 days</b> before the survey. |
| Population                             | Population                    | Persons in the Labour Force |                                                                          |
|                                        |                               |                             |                                                                          |



## Objective



EXPLAINED

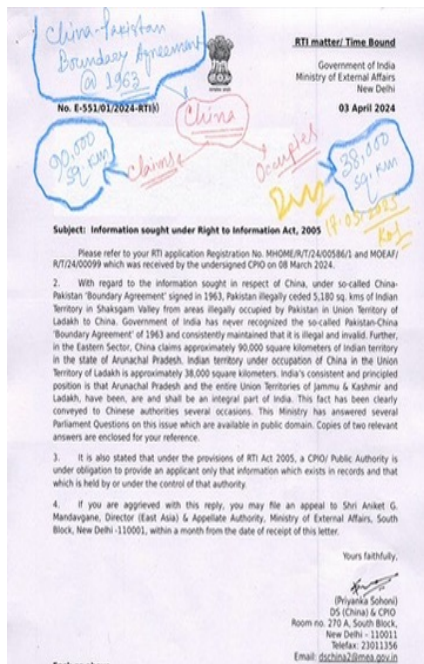
**E** Labour survey on monthly basis starting May

THE MINISTRY of Statistics and Programme Implementation will release Periodic Labour Force Survey on a monthly basis starting May along with quarterly reports for both rural and urban areas. The first quarterly bulletin of PLFS for April-June is slated to be released in August.

## ARUNACHAL

### **“Vain and Preposterous” : India rejects China’s latest renaming of places**

- Such attempts will not alter the reality that the state “was, is and will always remain an integral part of India”.
- China claims Arunachal Pradesh is part of **southern Tibet**.
- **Zangnan** is the Chinese name for Arunachal Pradesh.
  - China claims some 90,000 sq km of Arunachal Pradesh as its territory.
  - So renaming is their sovereign rights, claims China.
- China has renamed places in Arunachal Pradesh at least five times in the past.

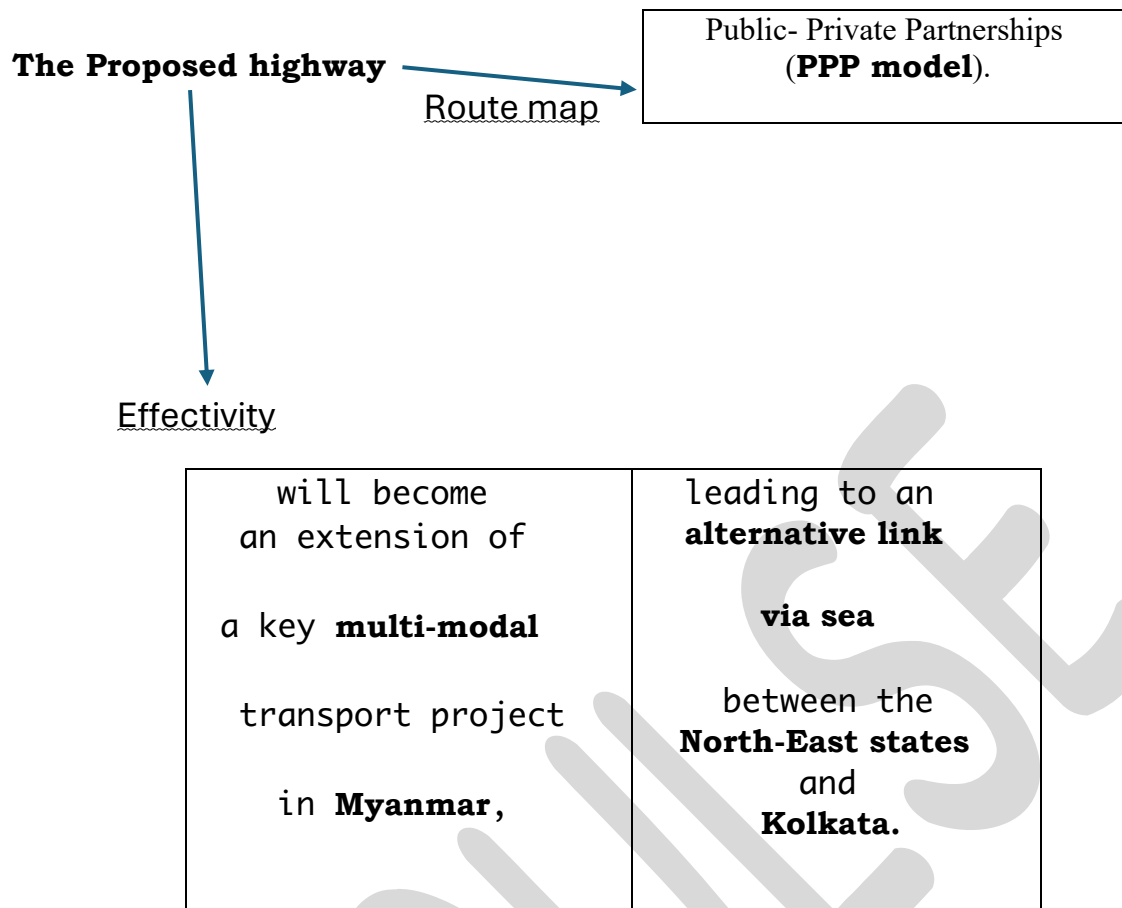


**17.05.2025**

**New North-East link to Kolkata will be via sea, giving Bangladesh a miss**

**from Shillong in Meghalaya  
 to Silchar in Assam**

implemented in  
**Hybrid Annuity Mode,**  
 one of the forms of



### Backdrop:-

#### → Bangladesh's verbal flexing :-

- The official described the project as a response to Bangladesh interim government chief adviser Muhammad Yunus's remark in Beijing this March that **North-East India is "landlocked" and Dhaka is the "only guardian of the ocean for all this region"**- he said this while seeking "extension of the Chinese economy".

#### → India's counter-fixing rhetoric :-

- **Days later**, on April 4, Yunus met Prime Minister Narendra **Modi** on the sidelines of the **BIMSTEC Summit** in **Bangkok**. The Ministry of External Affairs said Modi told Yunus that "**rhetoric that vitiates the environment is best avoided**".

## How will it work? :-

| Normal Feature |                   |            | Route                                                                   | Special Feature                                             | Implemented by                                                                             | Completion by                        |
|----------------|-------------------|------------|-------------------------------------------------------------------------|-------------------------------------------------------------|--------------------------------------------------------------------------------------------|--------------------------------------|
| The 166.8-km   | four-lane highway | along NH-6 | from Mawlyngkhung near <b>Shillong</b> to Panchgram near <b>Silchar</b> | is the first high-speed corridor project in the North-East. | It is being implemented by NHIDCL for the Ministry of Road Transport and Highways (MoRTH), | is expected to be completed by 2030. |

▽ At the other end,

| the <b>Kaladan Multi Modal Transit Transport Project</b> in <b>Myanmar</b> |     |                                                                |                           |                      |                   |
|----------------------------------------------------------------------------|-----|----------------------------------------------------------------|---------------------------|----------------------|-------------------|
| is being funded by the <b>Ministry to External Affairs</b>                 | and | connects the <b>Kolkata seaport</b>                            | to the <b>Sittwe port</b> | on the Kaladan river | in Rakhine state. |
|                                                                            |     | Further, the <b>Sittwe port connects to Paletwa in Mizoram</b> |                           |                      |                   |
|                                                                            |     | <b>through a road section.</b>                                 |                           |                      |                   |

The NHIDCL will take the project further

**from Zorinpui**

**to Lawngtlai**

**to Aizawl in Mizoram.**

## Escalation of India's Act East Policy :-

→ This is not only the first high speed corridor in the North-East, but the first such project in the hilly region.

|                                 |                                                     |         |         |                               |
|---------------------------------|-----------------------------------------------------|---------|---------|-------------------------------|
| Shillong-Silchar is significant | as <b>Silchar is the entry point for connecting</b> |         |         |                               |
|                                 | Mizoram                                             | Tripura | Manipur | Barak Valley region of Assam. |

Thus, it will become a major connectivity link for the entire North-East and an important milestone for developing the region as a gateway for India's Act East Policy.

## Non-dependency over Bangladesh :-

|                  |                                              |   |                |                                        |
|------------------|----------------------------------------------|---|----------------|----------------------------------------|
| cargo will reach | With the help of the <b>Kaladan project,</b> |   |                |                                        |
|                  | from                                         | → | to             | without being dependent on Bangladesh. |
|                  | Vizag and Kolkata                            | → | the North-East | →                                      |

### Effect

The high speed – corridor will ensure transportation of goods via road after that, which will spur economic activity in the region.

|                                      |                                                       |                                           |                                                                                         |
|--------------------------------------|-------------------------------------------------------|-------------------------------------------|-----------------------------------------------------------------------------------------|
| Currently,<br><b>the only access</b> | to the <b>seven</b><br><b>North-East</b><br>states is | through the<br><b>Siliguri Corridor</b> , | also called the<br><b>'Chicken's Neck'</b> ,<br><i>for the rest of</i><br><i>India.</i> |
|--------------------------------------|-------------------------------------------------------|-------------------------------------------|-----------------------------------------------------------------------------------------|

|                                                  |                   |     |                |
|--------------------------------------------------|-------------------|-----|----------------|
| The <b>other two points</b> of entry are through | <b>Bangladesh</b> | and | <b>Myanmar</b> |
|--------------------------------------------------|-------------------|-----|----------------|

Bangladesh has, however, curtailed access via Bay of Bengal

while maintaining its stronghold on movement through water in the region.

### India – Myanmar : Strategic regional closeness :-

Hence, the **Kaladan project** was jointly identified by India and Myanmar as an **alternative** – the link is expected to be fully operational by the time the shilling – Silchar highway is completed.





**18.05.2025**

## **Govt school enrolment drops in 23 states;**

### **MoE expresses concern, asks states to probe cause**

Officials point to **removal of ghost entries, move back to private schools after Covid**

### **Findings through PM-POSHAN lens :-**

- ▽ Minutes of meetings held by the MoE with 33 States and UTs in April to discuss performance, plan and budget under the PM-POSHAN scheme show that

|                                               |                                                                         |                             |                                 |                                   |
|-----------------------------------------------|-------------------------------------------------------------------------|-----------------------------|---------------------------------|-----------------------------------|
| student enrolment <b>dipped in 23 states,</b> | of which at least <b>8 witnessed declines exceeding 100,000:</b> led by |                             |                                 |                                   |
|                                               | <b>Uttar Pradesh</b><br>(21.83 lakh)                                    | <b>Bihar</b><br>(6.14 lakh) | <b>Rajasthan</b><br>(5.63 lakh) | <b>West Bengal</b><br>(4.01 lakh) |

### **ENROLMENT DIP: TOP 5 STATES**

| STATE       | ENROLMENT  |            | DROP       |
|-------------|------------|------------|------------|
|             | 2023-24    | 2024-25    |            |
| UP          | 1.74 crore | 1.52 crore | 21.83 lakh |
| Bihar       | 1.79 crore | 1.73 crore | 6.14 lakh  |
| Rajasthan   | 62.65 lakh | 57.02 lakh | 5.63 lakh  |
| West Bengal | 1.17 crore | 1.13 crore | 4.01 lakh  |
| Karnataka   | 43.49 lakh | 41.33 lakh | 2.15 lakh  |

## PM-POSHAN (Pradhan Mantri Poshan Shakti Nirman )Scheme

| Original name                          | Launched year | Students covered                               | Objective                                                                                                                                                              | Cost                                         |
|----------------------------------------|---------------|------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------|
| formerly the <b>Midday-meal Scheme</b> | 1995          | <b>Pre-primary to Class 8</b>                  | Besides addressing child nutrition,                                                                                                                                    | <b>Centre : State 60:40</b> basis            |
|                                        |               | <b>government and government-aided schools</b> | a cooked meal in school is known to <ul style="list-style-type: none"> <li>- boost attendance,</li> <li>- learning outcomes and</li> <li>- attention spans.</li> </ul> | with the <b>Centre supplying foodgrains.</b> |

### Cause of decline :-

| Two possible causes                                                                                                                                                                                                                                                                 |                                                                                                                                                                |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Removing ghost entries                                                                                                                                                                                                                                                              | Readmission to Private schools                                                                                                                                 |
| <p>is a <b>change in data-collection methodology—</b></p> <p><b>from school-wise reporting</b> (just total numbers) <b>to student-wise reporting</b> (name, address, parents’ names and Aadhaar details).</p> <p>This ongoing “data cleansing” may have removed “ghost” entries</p> | <p>several States have suggested enrolment may be moving from government to private schools in the post-Covid years, <b>reversing pandemic-era trends.</b></p> |
| Some States reported students <b>bringing their own tiffin.</b>                                                                                                                                                                                                                     |                                                                                                                                                                |

## DROP IN GOVT SCHOOL ENROLMENTS

| STATE      | ENROLMENT  |            | DROP      |
|------------|------------|------------|-----------|
|            | 2023-24    | 2024-25    |           |
| Assam      | 40.87 lakh | 39.19 lakh | 1.68 lakh |
| Tamil Nadu | 41.13 lakh | 39.48 lakh | 1.65 lakh |
| Delhi      | 17.61 lakh | 16.56 lakh | 1.05 lakh |
| J&K        | 10.33 lakh | 9.52 lakh  | 81,161    |
| Gujarat    | 52.35 lakh | 51.56 lakh | 79,416    |

(from PM-POSHAN PAB meeting minutes; enrolment includes primary+upper primary, and balvatika Gujarat, Rajasthan, WB, Assam, Delhi, J&K)

### Findings through UDISE+ report lens :-

▽ The drop first came to light late last year in the UDISE+ report for 2023-24,

which pointed to a sharp **fall of around 1.5 crore**  
in overall school enrolment (government and private)

compared to the 2018-19 to 2021-22 average.

↔ **PM-POSHAN** minutes show the trend continuing into 2024-25,  
**triggering fresh concern in the government.**

## **In reciprocal move, India places curbs on Bangladesh exports to North-East and abroad Readymade garments to Cotton yarn face restrictions: fish, edible oil spared**

▽ India decided Saturday to place restrictions on Bangladeshi products being exported to North-East India and overseas.

→ This appeared to be a *reciprocal move given that Dhaka had been imposing non-tariff barriers on Indian exports to Bangladesh.*

→ *The curbs come a month-and-a-half after Bangladesh interim government chief adviser Md. Yunus said in Beijing that North-East India is “landlocked” and Dhaka is the “only guardian of the ocean for all this region” — he made the remark while seeking “extension of the Chinese economy”.*

▽ The **Directorate General of Foreign Trade,** **under the Ministry of Commerce,** issued a notification Saturday.

|                                                                             |                                                                            |
|-----------------------------------------------------------------------------|----------------------------------------------------------------------------|
| will not be applicable to                                                   |                                                                            |
| import of fish, LPG, edible oil and crushed stone to India from Bangladesh. | <b>Bangladesh exports to Nepal/Bhutan <u>transiting through India.</u></b> |

## **To mobilise global support, Govt forms 7 all-party teams, 3 headed by Opposition leaders**

Shashi Tharoor, Ravi Shankar Prasad, Supriya Sule, Kanimozhi are part of teams to brief countries on Operation Sindoor

- As part of its efforts to rally global support for India's war against terror emanating from Pakistan and moving to isolate Islamabad internationally, the government announced Saturday that **seven multi-party delegations would visit different countries to convey India's message post the Pahalgam terror attack and Operation Sindoor.**
- Three of these delegations will be headed by Opposition leaders.

---

## **RARE EARTH MAGNETS :**

Chinese curbs @ Post -Trump Tariffs @ Indian EV makers also experiencing heat

EXPLAINED

E

Key to  
making  
EVs

RARE EARTH magnets provide the strong magnetic fields needed for efficient and powerful electric motors, including traction motors that drive EVs. The magnets also play a major role in other EV components like power steering systems, wiper motors, and braking systems. China dominates their market.

- ▽ The **problem with sourcing entire motors**, as against just the magnets in them, is that

|                                                                                                                                     |                                                                                                                                                                      |
|-------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| carmakers <b>would have to redesign</b> their cars to <b>accommodate the entire motor assembly</b> , which comes in standard sizes. | The ability to import magnets meant that manufacturers could calibrate the motor sizes to the design of their vehicles. ( <b>self-design would not be possible</b> ) |
|-------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------|

- ▽ While the **availability** of rare earth metals is **not limited to China**,

it is in the efficient **processing** of these critical elements where **Beijing has a substantial lead**,

which was **once enjoyed by the US and Japan**.

- ▽ **In recent years, Japan** has been able to **restart** some of its minerals' processing industry owing to government policies,

but

countries like the **US and India** are **heavily dependent** on **Chinese exports** of these metals.



**20.05.2025**

## **RESTORE GUARDRAILS**

SC **overruling post-facto environmental clearances** underlines that **sustainable development is not a zero-sum game**

|                                 |                |                                                  |                                                                                           |
|---------------------------------|----------------|--------------------------------------------------|-------------------------------------------------------------------------------------------|
| <b>Environmental clearances</b> | are guardrails | that ensure developmental projects do not injure | (i) ecosystems,<br>(ii) wildlife and natural resources and<br>(iii) harm people's health. |
|---------------------------------|----------------|--------------------------------------------------|-------------------------------------------------------------------------------------------|

### **Environmental Impact Assessment (EIA) Rules of 2006**

|                              |                                                                                                              |
|------------------------------|--------------------------------------------------------------------------------------------------------------|
| <u>Defining objective :-</u> | to strike the <u>right balance</u> between the <u>imperatives of development</u> and <u>sustainability</u> . |
|------------------------------|--------------------------------------------------------------------------------------------------------------|

### **Government's to be undermined efforts :-**

|                                                                 |                                                               |
|-----------------------------------------------------------------|---------------------------------------------------------------|
| The precautionary principle behind this provision has, however, | <u>been substantially undermined in the past eight years.</u> |
|-----------------------------------------------------------------|---------------------------------------------------------------|

**Ministry of Environment, Forest and Climate Change**

| 2017 Notification                                                                                 |                                                                                                 | Office Memorandum (OM)                                                                       |
|---------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------|
| allowed developers to obtain an <u>environmental clearance after beginning work</u> on a project. | The notification provided a <b>one-time window</b> to defaulters to comply with due procedures. | when the Centre issued an Office Memorandum (OM) to “identify” and “handle” violation cases. |
|                                                                                                   | However, in the process, it inaugurated a regime of post-facto clearances,                      |                                                                                              |
|                                                                                                   |                                                                                                 | which was consolidated in 2021                                                               |

### Supreme Court’s intervention :-

| <u>Supreme Court’s intervention to revise and correction</u>                                                                         |                                                                         |
|--------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------|
| Now, the Supreme Court <u>has called out the government for "going out of its way... to protect those who harm the environment".</u> | On May 16, a two-judge-bench                                            |
|                                                                                                                                      | <b>struck down</b> the <b>2017</b> notification and the <b>2021</b> OM. |

- ▽ **The verdict is not the first time** that the SC has admonished the Centre for diluting the EIA.

| <b>Common Cause vs Union of India (2017)</b> | <b>Alembic Pharmaceuticals vs Rohit Prajapati (2020)</b> | <b>January 2024 - stay</b> |
|----------------------------------------------|----------------------------------------------------------|----------------------------|
| a two-judge-bench ruled that                 | the Court held that post-facto clearances go against     | SC stayed the 2021 OM.     |
| the government had committed                 |                                                          |                            |

|                                                                                                               |                                                                  |                                                       |
|---------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------|-------------------------------------------------------|
| "serious lapses"                                                                                              |                                                                  |                                                       |
| in <b>allowing</b> large-scale mining to be "carried on <b>without forest and environmental clearances</b> ". | the "fundamental principles of environmental jurisprudence", and | that they were an "anathema to the EIA notification". |
| Such "violations of laws and policy <b>need to be prevented</b> ," it underlined.                             |                                                                  |                                                       |

### **Beneficiaries of 2017 Notification:-**

However, as an analysis by Indian Express newspaper in February revealed, the regulatory laxity precipitated by the 2017 notification **allowed more than 50 defaulting projects to go unpunished** –

**coal,  
iron and bauxite mines,  
steel and iron factories,  
cement plants and limestone quarries**

were approved without proper scrutiny of their impacts on people's health and ecology.

### **Conclusion:-**

The weakening of the EIA goes against the SC's environmental jurisprudence, where it has continuously expanded the scope of **Article 21** to include the **right to a healthy environment**.

- In its latest verdict, too, the Court has drawn attention to urban India's pollution crisis and reaffirmed the links between regulatory diligence and the Right to Life.
- The problem, however, is that *governments tend to view sustainability and development as binaries* – their ease-of-doing-business drives very often pay short shrift to the imperatives of environmental protection.
- **The Court has rightly questioned the tendency to see industry and ecology as locked in a zero-sum game.**
  - ~ Its words – "conservation of the environment and its improvement is an essential part of the concept of development" – must resonate among policymakers and inform regulatory processes.



## ENVIRONMENTAL LAWS IN INDIA

### Constitutional Provisions :

1. **Article 48A: Directive Principles of State Policy** - The State shall endeavor to protect and improve the environment and to safeguard the forests and wildlife of the country.
2. **Article 51A(g): Fundamental Duties** - It shall be the duty of every citizen of India to protect and improve the natural environment including forests, lakes, rivers, and wildlife, and to have compassion for living creatures.



### Key Environmental Laws

1. **The Water (Prevention and Control of Pollution) Act, 1974**
  - Establishes Pollution Control Boards at the Central and State levels to monitor and control water pollution.
2. **The Air (Prevention and Control of Pollution) Act, 1981**
  - Establishes measures to control air pollution and assigns responsibility to Pollution Control Boards.
3. **The Environment (Protection) Act, 1986**
  - Provides a framework for the protection and improvement of the environment.
4. **The Forest (Conservation) Act, 1980**
  - Aims to conserve forests and regulate the diversion of forest land for non-forest purposes.
5. **The Wildlife Protection Act, 1972**
  - Provides for the protection of wild animals, birds, and plants. Establishes protected areas such as national parks and wildlife sanctuaries.
6. **The Energy Conservation Act, 2001**
  - Promotes energy efficiency and conservation, establishing the Bureau of Energy Efficiency to implement measures for reducing energy consumption
7. **The National Green Tribunal Act, 2010**
  - Establishes the National Green Tribunal (NGT) for the effective and expeditious disposal of cases relating to environmental protection of forests.

**21.05.2025**

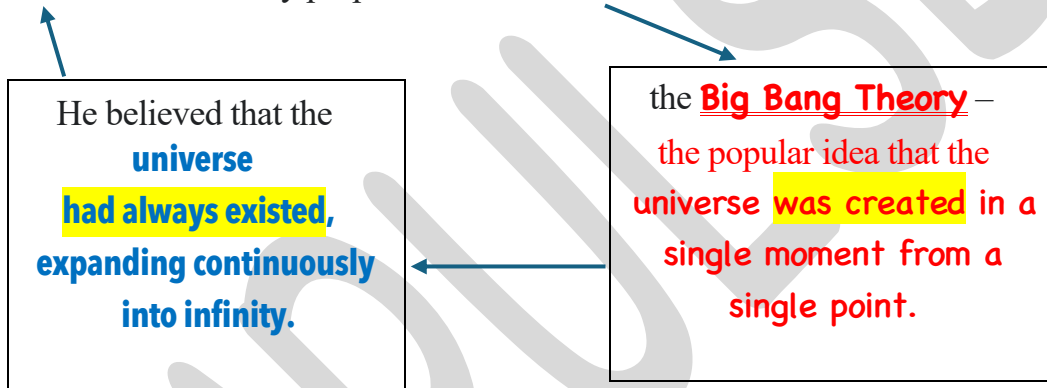
## **A LIFE IN SCIENCE**

**Jayant Narlikar** challenged dominant theories, nurtured talent and made niche research accessible, passed away at 87

▽ In his 1983 science fiction story, an Indian astrophysicist predicted what schools would look like in 2050.

→ Jayant Narlikar envisioned a scene where an alien, living among humans, would sit in front of a screen and attend online classes. The aliens are yet to manifest, but online classes became a reality for students far sooner, in 2020, when the Covid-19 pandemic hit.

▽ **Narlikar** also famously proposed an alternative to



▽ His long collaboration with **mentor and British** astrophysicist Fred **Hoyle** produced the most significant critique of the influential Big Bang theory.

→ The building blocks of the

### **Hoyle-Narlikar Quasi Steady State Cosmology theory**

it contends that the **universe did not originate in one Big Bang, but has existed for infinite time has developed in small spurts** – were forged when the young astrophysicist worked with his mentor in Cambridge.

▽ Narlikar saw himself as more than an academic. He wrote scripts for TV and was a regular contributor to newspapers.

→ The astrophysicist would often use the example of vegetable prices to explain the quasi-steady state cosmology theory – prices go up and

down depending on seasons, but over a decade, they go up regardless of the season.

- Likewise, he would say, the universe goes through cycles of contraction and expansion, but evolves over the long term.
- He **anticipated the predicaments of the AI age** in his novel, The Return of Vaman, in which a machine outwits its programmer.
- At the same time, Narlikar made it a mission to **counter pseudoscience and astrology.**
- He made science accessible while underlining that there were **no shortcuts to excellence.**

---

**22.05.2025**

## **WHAT IS TRUMP'S 'GOLDEN DOME', FUTURISTIC U.S. AIR DEFENSE SYSTEM?**

US President Donald Trump on Tuesday said he had shortlisted a design for the "Golden Dome" missile defence shield, and made General Michael Guetlein of the US Space Force in-charge of the project.

First floated by Trump this January,  
the **Golden Dome is inspired by Israel's Iron Dome air defence system.**

But it is **far more ambitious in scale and scope,** and  
seeks to **integrate "next-generation" technologies.**

### **Making 'space wars' a reality**

- ▽ Trump said the system would comprise, *among other things,*  
**space-based sensors and interceptors.**

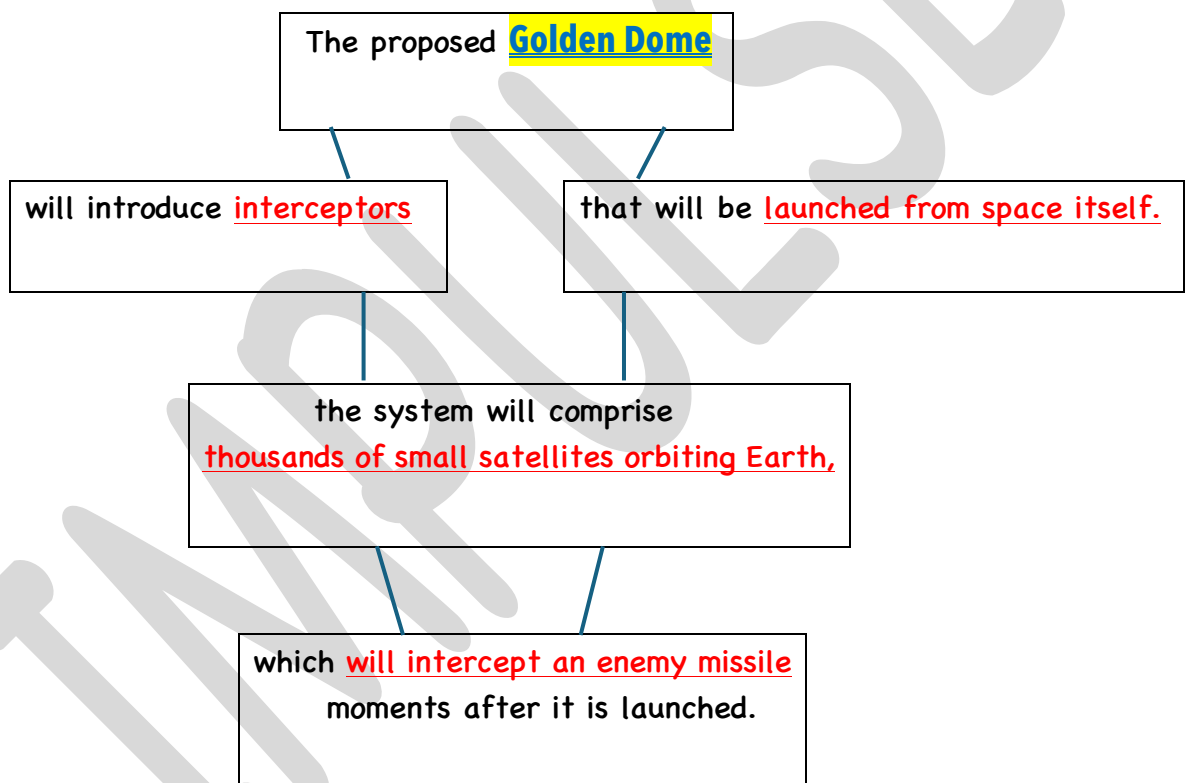
This would make the Golden Dome the  
**very first truly space-based weapon system.**

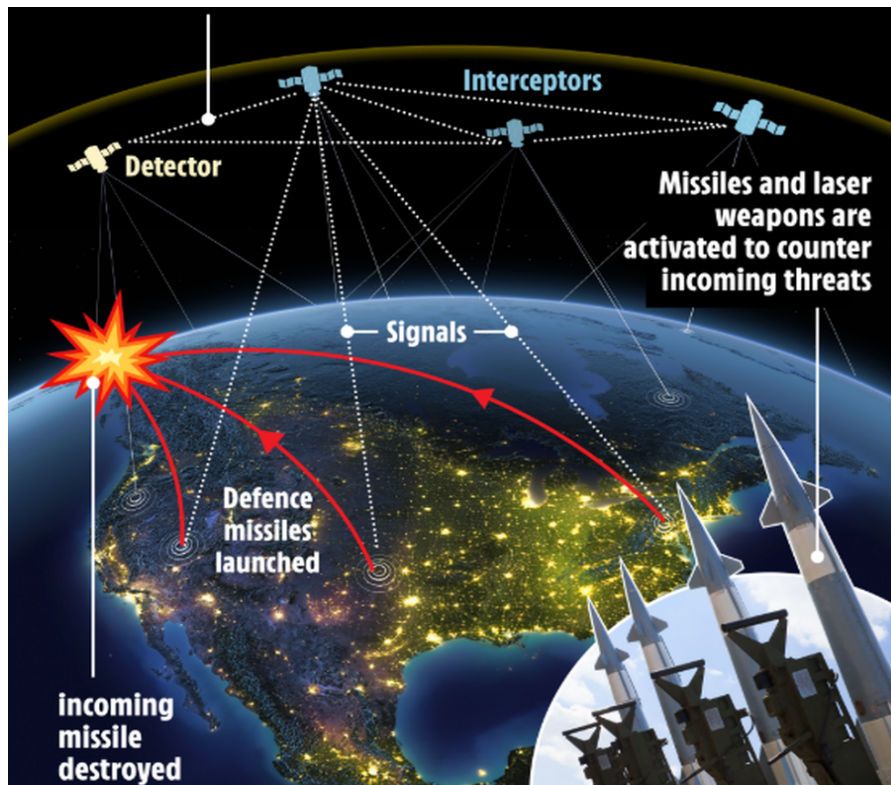
- ▽ Currently, the **use of space technology in defence** has largely been **restricted to reconnaissance.**



→ Satellites provide

|                                                      |                                                        |
|------------------------------------------------------|--------------------------------------------------------|
| <b>crucial targeting</b>                             |                                                        |
| and                                                  |                                                        |
| <b>other data<br/>for Earth-based weapon systems</b> |                                                        |
| such as                                              | <b>long-range missiles,<br/>guided munitions, etc.</b> |





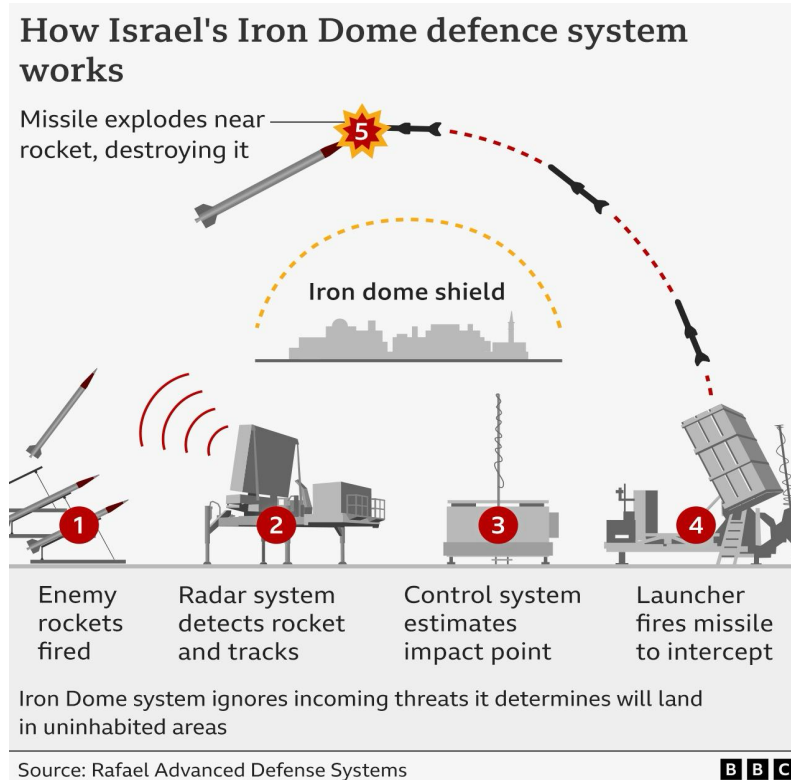
▽ This is **not an altogether novel idea.**

|                                         |                |                                |
|-----------------------------------------|----------------|--------------------------------|
| <b><u>Orbital weaponry,</u></b>         | have been      | the <b>US and Soviet Union</b> |
| that is, <b>weapon systems</b>          | conceptualised | during the <b>Cold War,</b>    |
| <b>placed in an orbit around Earth,</b> | and            |                                |
|                                         | designed by    | and                            |
|                                         |                | <b>Nazi Germany</b>            |
|                                         |                | during <b>World War II.</b>    |

Inspired by **Iron Dome**

|                                     |                      |                                |
|-------------------------------------|----------------------|--------------------------------|
| <b><u>Developed</u></b> in the      | <b>Comprised of</b>  | <b>System Functioning</b>      |
| <b><u>aftermath of the 2006</u></b> | ground-launched      | <b>capture and track</b>       |
| <b><u>Israeli-Lebanon war,</u></b>  | <b>Tamir</b>         | <b>enemy aerial threats,</b>   |
|                                     | interceptor missiles | from rockets, missiles, and    |
|                                     | and                  | artillery shells to low-flying |

|  |                                        |                                                      |
|--|----------------------------------------|------------------------------------------------------|
|  | an <b>array of radar installations</b> | aircraft, helicopters, and unmanned aerial vehicles. |
|--|----------------------------------------|------------------------------------------------------|



## Iron Dome vs Golden Dome

But the Iron Dome's capabilities pale in comparison to what Trump wants.

**Iron Dome**

**Golden Dome**

The Iron Dome is  
a short-range,  
ground-based aerial defence system  
that primarily relies on radars  
- **not satellites** –  
to **identify and track** enemy targets.

Golden Dome  
will likely comprise  
radar  
and  
other ground-based targeting systems  
as well.  
But its main selling point is  
the **deployment of space-based systems**.

The Iron Dome provides the **short-range defence** against relatively smaller and slower targets

the Golden Dome must be able to defend against Intercontinental Ballistic Missiles (**ICBMs**),

technology which **both China and Russia** - Washington's two main geopolitical rivals - possess.

**ICBM → Hypersonic missile**

ICBMs can be

- ◆ launched from **tens of thousands of kilometres away**, and
- ◆ travel to space as a part of their flight trajectory.

**Tracking** ICBMs necessitates the **use of satellites.**

**Space-based weapons** would be **more effective** than ground-based interceptor @ **neutralization**

(while they can be neutralised using ground-based interceptors, space-based weapons have long been thought to be more effective for this task given that they re-enter Earth's atmosphere in hypersonic speeds.)

**ICBMs** can carry **nuclear warheads.**

### More of a 'concept'

- Trump said the defence shield would cost some \$175 billion, and will be operational by January 2029, when his term ends.
    - ~ But industry experts are **sceptical of both this timeline and estimated cost.**
  - Republican lawmakers have pro-posed a \$2.5-billion initial investment for the Golden Dome as part of a broader \$150-billion defence package. But this funding is tied to the contentious "**One Big, Beautiful Bill**" that is expected to face significant hurdles in Congress.
  - **Technologically speaking, the idea behind Golden Dome is not far-fetched.** But it is untested, and at the moment, more of a "concept". This makes projecting timelines and costs very difficult.
-

## **India lost 18,200 hectares of primary forest in 2024, report by Global Forest Watch (GFW)**

|                                                                           |
|---------------------------------------------------------------------------|
| India <b>lost</b> 18,200 hectares of <b><u>primary forest</u></b> in 2024 |
| compared to 17,700 hectares in <b>2023</b> ,                              |

|                               |                                                                                     |
|-------------------------------|-------------------------------------------------------------------------------------|
| India's humid primary forests | <u>mature natural <b>tropical</b> forests</u> that haven't been cleared and regrown |
|-------------------------------|-------------------------------------------------------------------------------------|

|                                                                    |                                                                                                                                                                                                                                   |                 |                 |                 |
|--------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------|-----------------|-----------------|
| <p>The GFW data said</p> <p><b><u>Humid Primary Forest</u></b></p> | <p>♦ <b><u>Between 2002 and 2024</u></b> , the country lost 3,48,000 hectares (<b><u>about 5.4%</u></b>) of humid primary forest</p> <p>- This is equivalent to 15 % of India's total tree cover loss during the same period.</p> |                 |                 |                 |
|                                                                    | <p>♦ <b><u>Between 2019 and 2024</u></b>, India lost 1,03,000 hectares (<b><u>1.6%</u></b>) of humid primary forest,</p> <p>- which is 14% of its total tree cover loss in those years.</p>                                       |                 |                 |                 |
|                                                                    | <b>2022</b>                                                                                                                                                                                                                       | <b>2021</b>     | <b>2020</b>     | <b>2019</b>     |
|                                                                    | 16,900 hectares                                                                                                                                                                                                                   | 18,300 hectares | 17,000 hectares | 14,500 hectares |

( Look at this data to come to the conclusion whether decline has been **SHARP** since the last 5 years.....**Answer : NO**.....**UPSC never would ask data of these sort as they focus over applicability**.....so don't try to mug up )

↔ The World Resource Institute (**WRI**) established GFW @ 1997 → as part of the Forest Frontiers Initiative → started as **a network of NGO** → situated in Washington DC, **USA**

UPSC's take from hereabove :-

- 1) ~~A body of UN~~
- 2) NGO
- 3) USA based

Primary and secondary forests are both types of forest ecosystems, but they differ significantly in their history and ecological characteristics.

**Primary forests**

are forests that have not been significantly disturbed by human activities and maintain their original ecological condition.

**Secondary forests**

have regrown after disturbances like logging, fire, or other events.



## FOREST TYPES OF INDIA Champion and Seth (1968)

### I. Moist Tropical Forests

01. Tropical wet evergreen forests
02. Tropical semi-evergreen forests
03. Tropical moist deciduous forests
04. Littoral and swamp forests

### II. Dry Tropical Forests

05. Tropical dry deciduous forests
06. Tropical thorn forests
07. Tropical dry evergreen forests

### III. Montane Sub-Tropical Forests

08. Sub-tropical broad leaved hill forests
09. Sub-tropical pine forests
10. Sub-tropical dry evergreen forests

### IV. Montane Temperate Forests

11. Montane Wet temperate forests
12. Himalayan moist temperate forests
13. Himalayan dry temperate forests

### V. Sub-Alpine Forests

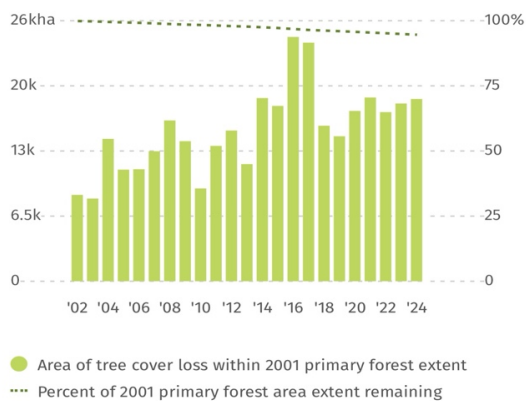
14. Sub alpine forests

### VI. Alpine Scrub

15. Moist alpine scrub
16. Dry alpine scrub

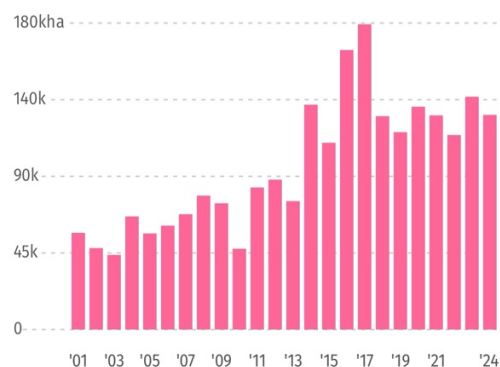
#### PRIMARY FOREST LOSS IN INDIA

From **2002 to 2024**, India lost **348 kha of humid primary forest**, making up **15%** of its total tree cover loss in the same time period. **Total area of humid primary forest in India decreased by 5.4%** in this time period.



#### TREE COVER LOSS IN INDIA

From **2001 to 2024**, India lost **2.31 Mha** of tree cover, equivalent to a **7.1%** decrease in tree cover since **2000**, and **1.29 Gt** of CO<sub>2e</sub> emissions.



TREE COVER LOSS BY DOMINANT DRIVER IN INDIA



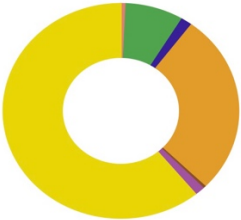
In **India** from **2001** to **2024**, **29%** of tree cover loss occurred in areas where the dominant drivers of loss resulted in deforestation.

Drivers of deforestation

- Hard commodities  
**16.3 kha**
- Permanent agriculture  
**620 kha**
- Settlements & Infrastructure  
**30.6 kha**

Drivers of temporary disturbances

- Logging  
**182 kha**
- Other natural disturbances  
**35.1 kha**
- Wildfire  
**8.33 kha**
- Shifting cultivation  
**1.39 Mha**



LOCATION OF TREE COVER IN INDIA



In **India** as of **2010**, the top **7** regions represent **51%** of all tree cover. **Assam** had the most tree cover at **2.57 Mha** compared to an average of **817 kha**.

|   |              |          |
|---|--------------|----------|
| 1 | Assam        | 2.57 Mha |
| 2 | Chhattisgarh | 2.28 Mha |
| 3 | Kerala       | 2.28 Mha |
| 4 | Odisha       | 1.92 Mha |
| 5 | Karnataka    | 1.88 Mha |

LOCATION OF TREE COVER LOSS IN INDIA



In **India**, the top **4** regions were responsible for **52%** of all tree cover loss between **2001** and **2024**. **Assam** had the most tree cover loss at **340 kha** compared to an average of **67.9 kha**.

|   |           |         |
|---|-----------|---------|
| 1 | Assam     | 340 kha |
| 2 | Mizoram   | 334 kha |
| 3 | Nagaland  | 268 kha |
| 4 | Manipur   | 255 kha |
| 5 | Meghalaya | 243 kha |

## TREE COVER IN INDIA



As of **2000**, **9.8%** of **India** land cover was **tree cover** with **>30%** canopy density.

● Tree Cover

**32.6 Mha**

● Other Land Cover

**265 Mha**



## COMPONENTS OF NET CHANGE IN TREE COVER IN INDIA



From 2000 to 2020, **India** experienced a net change of **874 kha** (**1.3%**) in tree cover.

● Stable forest

**59.2 Mha**

● Gain

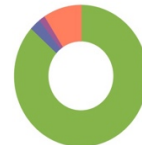
**1.88 Mha**

● Loss

**1.01 Mha**

● Disturbed

**6.17 Mha**



## TREE COVER GAIN IN INDIA COMPARED TO OTHER AREAS



From **2000** to **2020**, **India** gained **1.78 Mha** of tree cover equal to **1.4%** of the global total.

- 1 Russia
- 2 Canada
- 3 United States
- 4 Brazil
- 5 China

37.2 Mha

17.0 Mha

14.0 Mha

8.07 Mha

6.69 Mha

## NATURAL FOREST IN INDIA



As of **2020**, **15%** of land cover in **India** was natural forests and **2.0%** was non-natural tree cover.

● Natural forests

**44.4 Mha**

● Non-natural tree cover

**5.84 Mha**

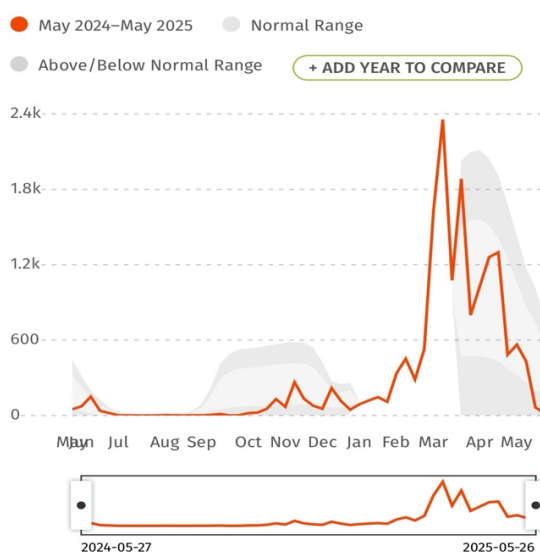
● Other land cover

**248 Mha**



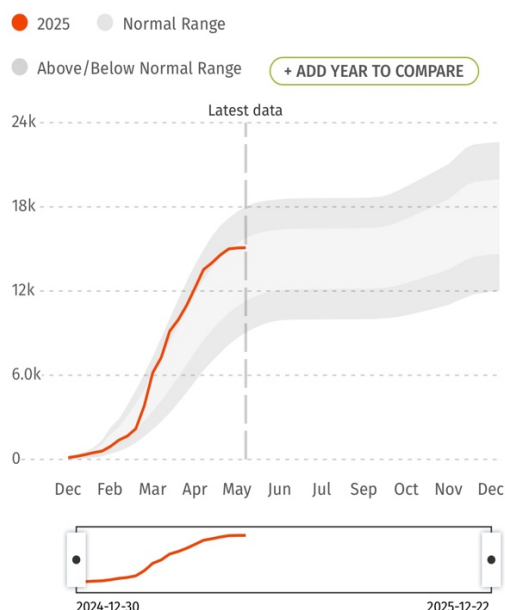
#### WEEKLY FIRE ALERTS IN INDIA

In **India** the peak fire season typically begins in **mid-February** and lasts around **13 weeks**. There were **16,521 VIIRS** fire alerts reported between **27th of May 2024** and **26th of May 2025** considering **high confidence alerts** only. This is **normal** compared to previous years going back to **2012**.



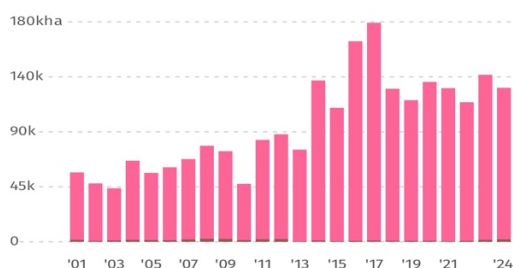
#### CUMULATIVE FIRE ALERTS IN INDIA

In **India** there have been **15,090 VIIRS** fire alerts reported so far in **2025** considering **high confidence alerts** only. This total is **normal** compared to the total for previous years going back to **2012**. The most fires recorded in a year was **2021**, with **23,223**.



#### TREE COVER LOSS DUE TO FIRES IN INDIA

From **2001** to **2024**, **India** lost **36.2 kha** of tree cover from fires and **2.27 Mha** from all other drivers of loss. The year with the most tree cover loss due to fires during this period was **2008** with **2.77 kha** lost to fires — **3.5%** of all tree cover loss for that year.



For detailed study:-

<https://www.globalforestwatch.org/dashboards/country/IND/>

**24.05.2025**

## **A Good Monsoon**

**It will be the icing on the cake for an economy that has emerged from a prolonged period of high food inflation**

▽ **This May** has been rather wet, with India as a whole receiving **68.4% more than the normal rainfall** for the month so far.

➤ And it isn't just rain.

- **No record-breaking temperatures or significant heatwaves** enveloping large parts of the country have been reported.
- **Intermittent showers** – enabled both by western disturbance winds carrying moisture from the Mediterranean Sea towards the Subcontinent and similar incursions from the Bay of Bengal and the Arabian Sea – have contributed to a wetter and cooler-than-usual summer this time.
- The pre-monsoon season from March 1 to May 23 has cumulatively reported 16.8% **above long-period average precipitation**, with as many as 27 out of the total 36 meteorological subdivisions recording 20% or more **surplus rain**.
- Each **thunderstorm** has brought down temperatures just when heat conditions were building up.

▽ While all these have made the ongoing summer relatively bearable, the impact of that, if any, on the monsoon itself remains to be seen.

→

| <b>El Nino</b>                                                                                                                                                           | <b>Indian Ocean Dipole</b>                                                         |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------|
| The India Meteorological Department has forecast above-normal rainfall for the monsoon season (June-September) based on there being <b><u>no El Nino this time</u></b> . | The <b><u>Indian Ocean Dipole, too, is expected to be in "neutral" state</u></b> . |

These two ocean indicators known to influence the monsoon are favourable, just as the south-westerly moisture-laden winds blowing from the Indian Ocean are well in place.

→ But the monsoon also depends on → → **so-called heat lows developing over north-west India.**

- ~ The intense solar heating of the landmass during the summer creates the low-pressure area that acts as a **suction device** for drawing in moist air from the monsoon trough.
- ~ While the monsoon can turn out deficient due to the absence of any proper heat low formation, the hope is that it will be compensated for by the **favourable oceanic and atmospheric wind factors.**

▽ A good monsoon will be the **icing on the cake for an economy** that has emerged from **a prolonged period of high food inflation, roughly between July 2023 and December 2024.** The best measures of relief on that front are annual consumer food price inflation falling to a 42-month-low of 1.8 per cent in April and **wheat stocks in government warehouses climbing to a four-year-high on May 1.** While that, in conjunction with easing international food and commodity prices, offers some comfort, the monsoon's performance will still matter. Policymakers and economic agents should brace themselves for the quantum of rainfall as well as its spatial and temporal distribution during the upcoming four-month season being subpar. That would seem an outside possibility for now - the monsoon may, for many in the south, have already arrived - but it is not to be discounted.

### **Quick Look:-**

- ◆ The **Indian Ocean Dipole (IOD)**

↓  
is a climate pattern

↓  
in the **Indian Ocean**

↓  
characterized by

→ fluctuations in sea surface temperatures  
and  
atmospheric conditions  
between the western and eastern parts of the ocean.

- ◆ It's similar to El Niño but in the Indian Ocean, impacting weather patterns and monsoon activity.



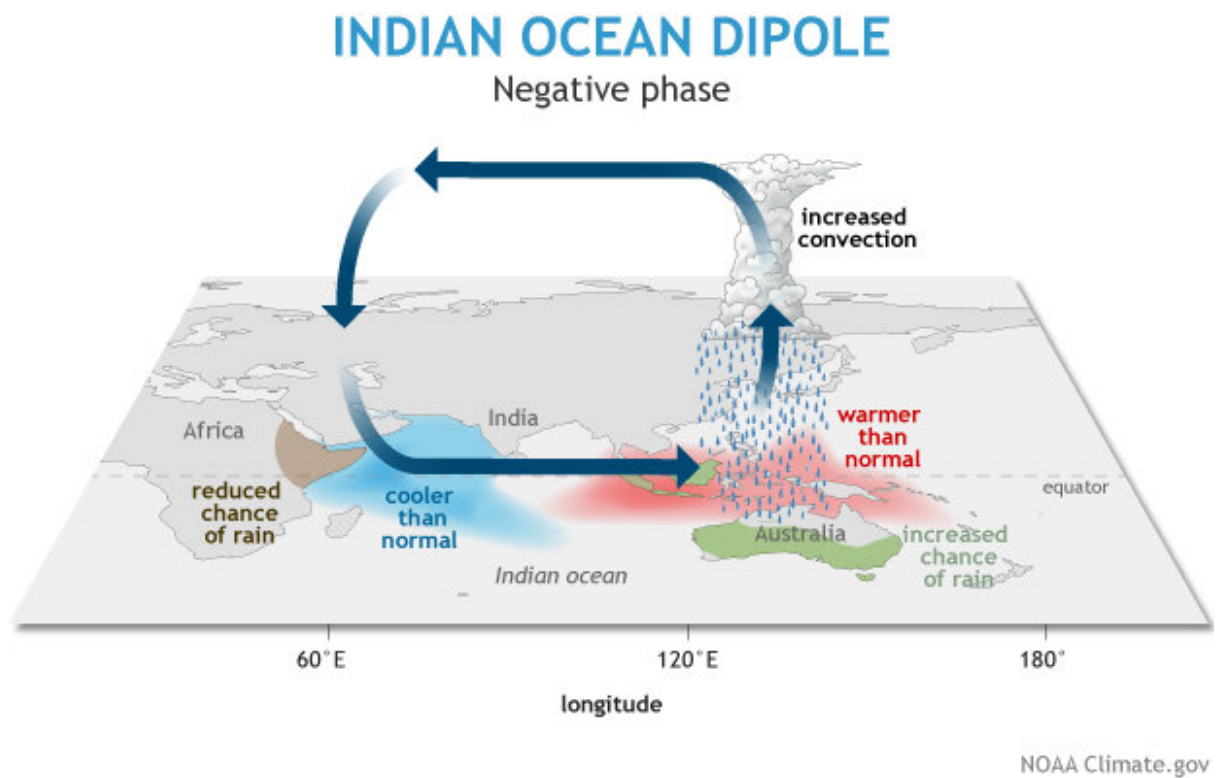
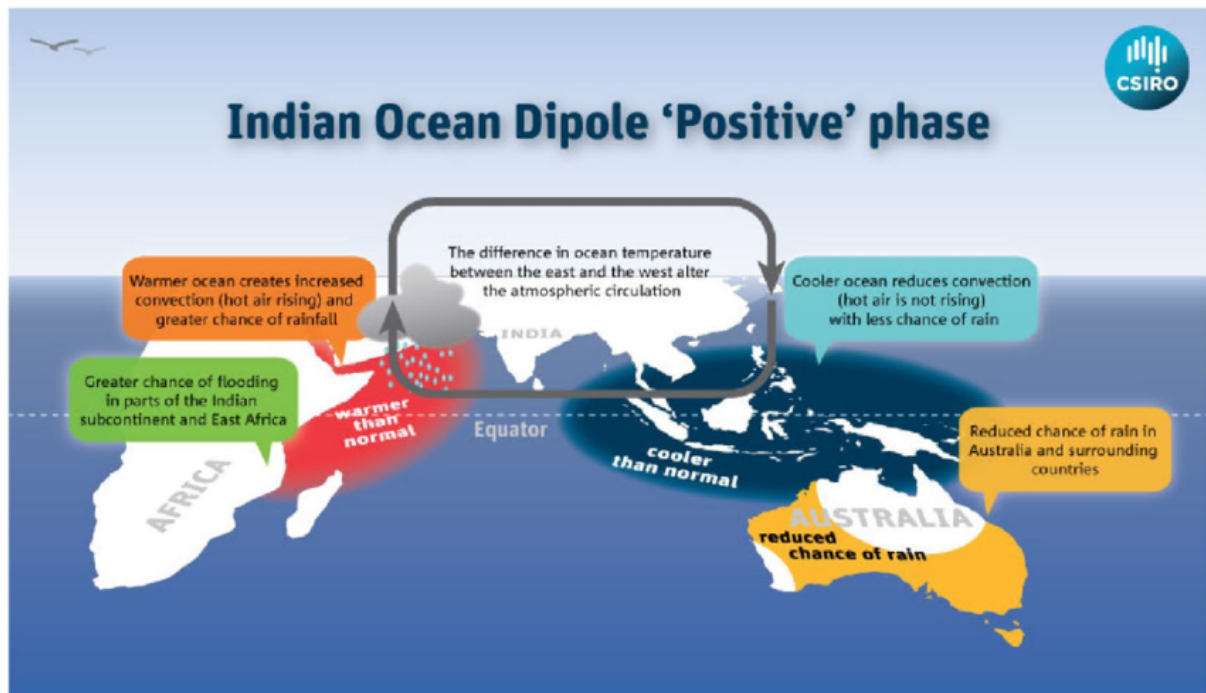
- ♦ A positive IOD means

|                                                           |
|-----------------------------------------------------------|
| cooler-than-normal waters in the eastern Indian Ocean and |
| warmer-than-normal waters in the western Indian Ocean,    |

- ♦ negative IOD → vice versa

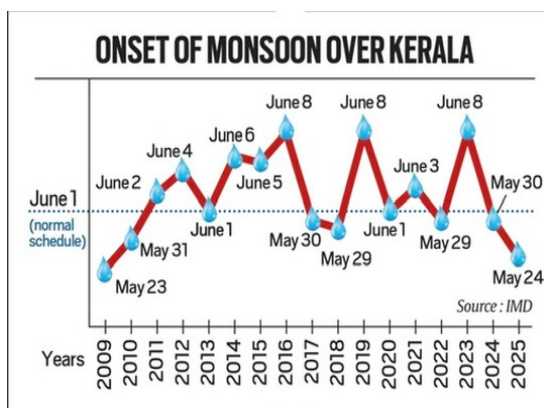
### Detailed Look :-

- **What it is:** The IOD is a climate phenomenon where sea surface temperatures and atmospheric conditions oscillate between the western and eastern parts of the Indian Ocean.
- **How it works:** During a positive IOD, cooler-than-normal sea surface temperatures are found in the eastern Indian Ocean (near Indonesia), while warmer-than-normal temperatures are observed in the western Indian Ocean (off the coast of Africa). Conversely, during a negative IOD, the opposite pattern occurs.
- **Impact on Indian monsoon:** While there's no established direct correlation between IOD and the Indian summer monsoon, some studies suggest a positive IOD can lead to above-normal rainfall over central India.
- **Impact on global climate:** The IOD can influence weather patterns and climate variability across a wide area, including the Indian Ocean region and even some parts of the mid-latitudes.
- **Comparison with El Niño:** The IOD is similar to El Niño in that it involves coupled ocean-atmosphere interactions and impacts regional climate. **However, the IOD occurs in the Indian Ocean, while El Niño occurs in the Pacific Ocean.**



**27.05.2025**

# Monsoon hits Kerala, earliest onset since 2009, says IMD



## EXPLAINED **E** Changing pattern

EARLY ARRIVAL of monsoon has no bearing on the amount of rainfall that can be expected during the four-month season. Weather has not been playing to the script this year — May hasn't been as hot as expected. Parts of central and western India have seen unusual rainfall over the last week.

## What **monsoon 'onset' means**, why it is early

Multiple factors led to the southwest monsoon **reaching Kerala eight days early**. But this will not have any bearing on the amount of rainfall during the season

- ☐ Reached Kerala eight days ahead of its normal date of arrival on **June 1**, according to the IMD.
- ☐ This was the earliest onset of the monsoon over the Indian mainland **since 2009**, when it reached Kerala on May 23.

## When is the arrival of monsoon declared?

To declare the onset of the southwest monsoon, the IMD considers three main criteria.

### 1) **RAINFALL:**

If 60% of the available 14 southern meteorological stations in

Kerala,  
Lakshadweep and  
Karnataka

report rainfall of 2.5 mm or more  
for two consecutive days.

The stations are: Minicoy, Amini, Thiruvananthapuram, Punalur, Kollam, Allapuzha, Kottayam, Kochi, Thrissur, Kozhikode, Thalassery, Kannur, Kudulu and Mangalore.

### 2) **WIND FIELD:**

|                           |                                        |                                    |                                                                                                                                                                                         |                                                           |
|---------------------------|----------------------------------------|------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------|
| The<br>westerly<br>winds, | which blow from<br><b>west to east</b> | in<br><b>middle<br/>latitudes,</b> | <b>need to flow at<br/>a certain speed</b><br>(sustained speeds of<br>27-37 kmph)<br>and<br><b>have a specific<br/>depth</b><br>(which refers to the<br>thickness of the<br>wind layer) | for the IMD to<br>declare the<br>onset of the<br>monsoon. |
|---------------------------|----------------------------------------|------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------|

### 3) **Heat:**

According to IMD, the INSAT-derived **Outgoing Longwave Radiation (OLR) value** (a measure of the energy emitted to space by Earth's surface, oceans, and atmosphere) should be below 200 watts per sq m (wm<sup>2</sup>) in the box confined by 5-10 degrees N latitude and 70-75 degrees E latitude.

If these criteria are fulfilled, the IMD declares the monsoon onset over Kerala on the second day of observations.

## What led to the early onset?

Multiple, large-scale atmospheric-oceanic and local factors developed and favoured the early monsoon onset this year.

### 1) CONVECTION:

- In 2025,

sea surface temperatures in the Arabian Sea and Bay of Bengal continued to be higher than average.

- This could have played a significant role in the early onset of the monsoon.

|                                                 |                                                |                                                                                                                                               |
|-------------------------------------------------|------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------|
| That is because <b>warmer-than-usual waters</b> | lead to <b>intense atmospheric convection,</b> | a process in which <b>moist air rises, cools, and condenses</b><br><br><b>to form clouds and low-pressure systems</b><br><br>that bring rain. |
|-------------------------------------------------|------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------|

### 2) MADDEN-JULIAN OSCILLATION (MJO):

This refers to an **ocean-atmosphere interaction in the equatorial region** which influences the Indian monsoon.

- **In its active phase**, MJO results in **more than average** rainfall for a particular time of the year, *especially in tropical regions, including India.*
- The IMD said on May 22 that the MJO in the region moisture-laden air to the country which contributes to the rain during the monsoon season.
- *This year, however, as these winds were stronger and more organised, they pushed the moisture-laden air towards India quickly, thereby aiding early monsoon onset.*

**(see ref. @ pg.no. \_\_\_\_\_)**

### 3) LOW-PRESSURE AREA:

Experts said that **a low-pressure system formed over the Arabian Sea last week, which accelerated the movement of the monsoon.** These systems typically attract moisture-laden air northward, leading to rainfall.

## Does an early onset or delay foretell a good monsoon?

**Answer :- NO**

No, it does not – just as a delay does not foretell a poor monsoon. The onset is just an event that happens during the progress of the monsoon over the Indian subcontinent.

A delay of a few days, or perhaps the monsoon arriving a few days early, has no bearing on the quality or amount of rainfall, or its regional distribution across the country, during the season.

---

## IMD to receive high resolution

### **Bharat Forecast System (BFS) today**

#### Model will boost IMD's weather forecasting

- ▽ The India Meteorological Department (IMD) will soon adopt the Bharat Forecast System (BFS) **which offers the highest resolution among weather models.**
- ▽ This move will **significantly enhance**
  - the IMD's weather forecasting capabilities, **especially** with respect to **extreme rainfall and cyclones.**
- ▽ IMD will operationalise the model starting this monsoon season.

---

## Summary Understanding :-

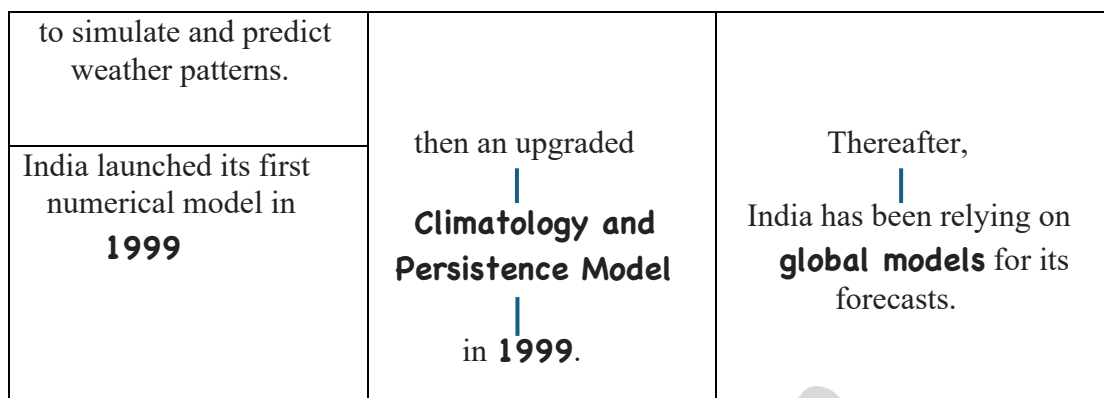
| <b>Bharat Forecast System (BFS)</b>                                                                                                                                                                                                                                                                               | <b>Coupled Forecasting System (CFS)</b>                                                                                                                                                                                                                                                                                                                                      |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p>IMD's new Bharat Forecast System (BFS) promises to <b>improve forecast capabilities</b> and <b><u>accuracy to a 6 km range</u></b>, compared with the current 12 km</p> <p>.....30% improvement in extreme rainfall forecasts along with other climate change-induced events that are trickier to predict.</p> | <p><b>developed under the Monsoon Mission Project.</b></p> <p>The <b>original model</b> framework of CFS was developed by <b><u>US-based</u></b> National Center for Environmental Prediction.</p> <p><b><u>For Indian use</u></b>, it <b><u>was modified</u></b> to provide forecasts → → for the Indian monsoon region for different spatial and temporal resolutions.</p> |



|                                                                                                                                                                                                                 |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p>The first weather model with such high resolution.</p> <p>The BFS is India's first <b>indigenously</b> built weather model.</p> <p><b><u>Spatial Resolution</u></b></p> <p><u>6 km x 6 km = 36 sq km</u></p> | <p>In addition, it <b>also runs the <u>Global Forecasting System (GFS)</u></b>, which a coupled model (factors-in ocean and atmospheric parameters),</p> <p>for issuing the <u>weather forecasts at time scales ranging from a few hours, to five days, a month to a season.</u></p> <p><b><u>Spatial Resolution</u></b></p> <p>The resolution of the existing weather model is <u>12 km x 12 km</u>, which means forecasters consider <b>144 sq km area as one unit</b> and the forecast for this unit is considered uniform.</p> |
| <p><b><u>Advantage :-</u></b></p> <p>The <b>improved spatial resolution to 6 km</b> is expected to <b>improve forecasts, especially for extreme weather events</b> starting the monsoon this year.</p>          | <p><b><u>Drawback :-</u></b></p> <p><u>So any variation occurring within this 144 km cannot be captured</u> and that limits the forecasting skills, given that the extreme rainfall events and overall weather extremes are on a rise,"</p>                                                                                                                                                                                                                                                                                        |

- ▽ **Developed by** Pune-based **Indian Institute of Tropical Meteorology (IITM)** an autonomous institute of the **Ministry of Earth Sciences, GoI**, the BFS offers a spatial resolution of 6km x 6km, making it the first weather model with such high resolution. **In fact, weather modellers have also been working to fine-tune this resolution to 3km and 1km.**

|                                                                                                       |  |  |
|-------------------------------------------------------------------------------------------------------|--|--|
| <p><b>Numerical weather models</b></p> <p>are computer models that rely on mathematical equations</p> |  |  |
|-------------------------------------------------------------------------------------------------------|--|--|



Globally, weather forecasters run multiple models by keying-in the latest atmospheric and/or oceanic initial conditions as data feeds.

They **use high performance computers** to run these models which in turn provide output, whose interpretation is issued as weather forecasts.

## **CORE WEAKNESS**

### **Performance of eight fundamental industrial sectors in April suggests loss of growth momentum. It has implications, lessons**

The index Of Eight Core Industries (ICI) for April 2025 released by the Department for Promotion of Industry and Internal Trade shows that the monthly growth rate of the index fell to a nine-month low of just 0.5 per cent. In other words, the index grew just 0.5 per cent in April this year over the same month last year. This index comprises the eight most fundamental industrial sectors of the economy - coal, natural gas, crude oil, refinery products (such as petrol and diesel), fertilisers, steel, cement and electricity (with differing weights) - and it maps the volume of production in these industries. The eight core industries comprise 40.27 per cent of the weight of items included in the Index of Industrial Production (IIP). Since these eight industries essentially serve the role of basic and/or intermediate ingredient in the functioning of the broader economy, this index's health is important to the state of the economy.

The performance in April suggests a sharp loss of growth momentum relative to the preceding months. For instance, the index had grown by 4.6 per cent in March. In comparison, data from the index shows that of the eight industries, six experienced a weakness in growth momentum. The worst affected set of industries was refinery products, which incidentally have the highest

weightage in the index (almost 30 per cent), as they clocked a negative growth rate (a contraction) of 4.5 per cent; it is the poorest showing since November 2022. Crude oil and fertilisers also witnessed contraction while the electricity index grew by just 1 per cent. Apart from the data for April, also noteworthy was the data for the full financial year that ended in March. In 2024-25, the core industries index grew by 4.5 per cent; this is the slowest increase since the post-pandemic recovery in 2021-22.

At one level, the slowdown in April is understandable. The global economy received the shock of President Donald Trump's reciprocal tariffs and the ensuing surge of uncertainty has meant that most economic and financial metrics across the world have shown some impairment. However, the weakness, and especially the sharpness of it, and that too both in April and in the full year data for FY24, points to domestic causes as well. If these eight industries are not growing fast enough, the rest of the economy is unlikely to either. Given the tepid start to the year, observers such as the Centre for Monitoring Indian Economy (CMIE) are dialling down the forecasts for both the June quarter as well as the full financial year. Readers and policymakers should watch out for two other data sets due to be released in days to come - the IIP and the GDP - to better understand the current state of the economy.

### Quick Look:-

The index Of Eight Core Industries (ICI) for April 2025

**released by the Department for Promotion of Industry and Internal Trade**

| <b>Eight Core industries</b>                            | <b>Total weightage<br/>40.27% of IIP</b> |
|---------------------------------------------------------|------------------------------------------|
| <b>1) refinery products (such as petrol and diesel)</b> | 28.04%                                   |
| <b>2) electricity</b>                                   | 19.85%                                   |
| <b>3) steel</b>                                         | 17.92%                                   |
| <b>4) coal</b>                                          | 10.33%                                   |
| <b>5) crude oil</b>                                     | 8.98%                                    |
| <b>6) natural gas</b>                                   | 6.88%                                    |
| <b>7) cement</b>                                        | 5.37%                                    |
| <b>8) fertilisers</b>                                   | 2.63%                                    |

The **worst affected set of industries was refinery products**, which incidentally have the highest weightage in the index (almost 30 per cent).

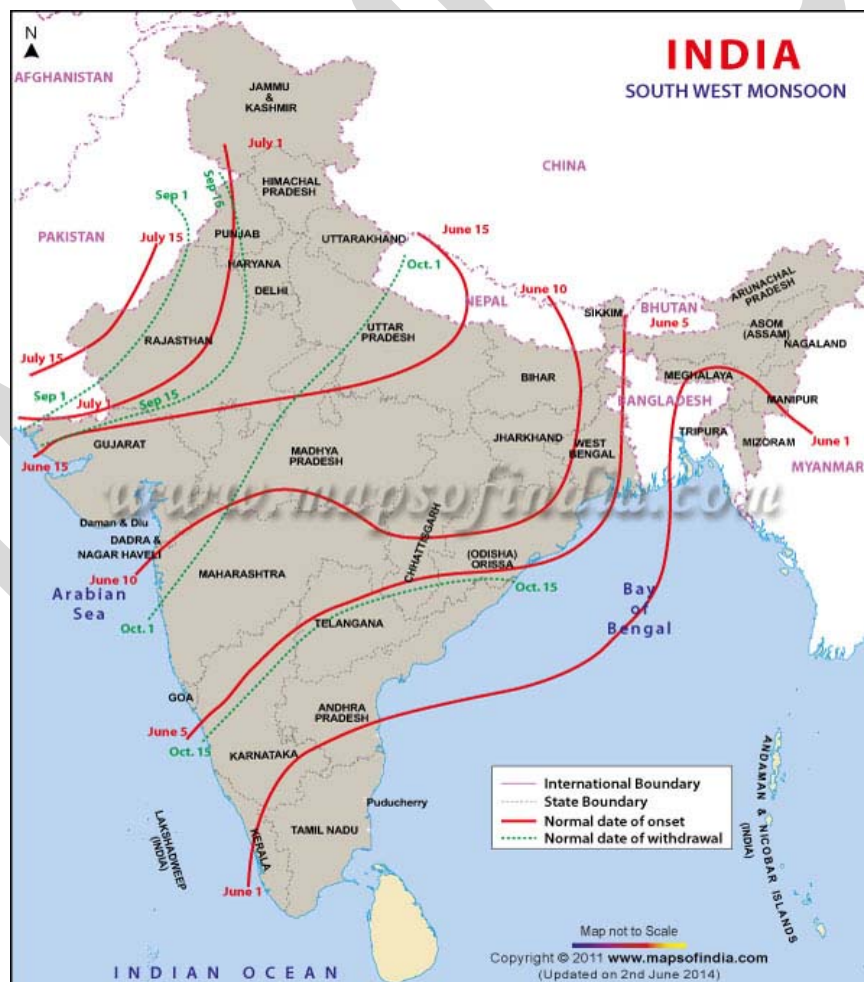
**28.05.2025**

## **MADDEN – JULIAN OSCILLATION**

Moving system of clouds, wind and pressure; **occurs in the equatorial region**,  
**influences the Indian monsoon**

### **Early Onset of Monsoon:-**

| Kerala                                                                                        | Mumbai                                                                             |
|-----------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------|
| arrived on May 24, <b>eight days earlier</b> than the normal onset date                       | reached <b>two weeks in advance</b> on May 26.                                     |
| This was also the <b>earliest</b> the monsoon arrived in Mumbai on record <b>since 2009</b> . | This was also the <b>earliest</b> the monsoon arrived in Mumbai <b>on record</b> . |



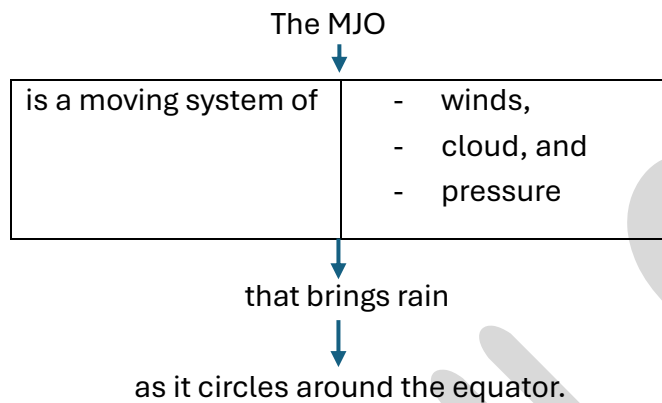
## Factors:-

Several large-scale atmospheric oceanic and local factors developed and favoured the early monsoon onset but one of the key drivers was the Madden – Julian Oscillation (MJO), according to the India Meteorological Department (IMD).

**(see ref. @ pg.no. \_\_\_\_\_)**

## What is MJO?

▽



- ▽ **The phenomenon takes its name from the two scientists** who identified it in 1971 – Roland Madden and Paul Julian, who then worked at the National Centre for Atmospheric Research in Boulder, Colorado.

## Activity :-

|                                                                                       |                                                                             |
|---------------------------------------------------------------------------------------|-----------------------------------------------------------------------------|
| The system<br><b>typically travels eastward</b><br>at a speed of 4–8 metres / second. | It <u>goes around the globe</u>                                             |
|                                                                                       | in <b>30–60 days</b> on average,<br>but can sometimes take <b>90 days</b> . |

As it moves, strong MJO activity  
often **splits the planet into two parts**

| Active phase    | Suppressed phase     |
|-----------------|----------------------|
| brings rainfall | suppressers rainfall |

|                                                                   |                                                                               |
|-------------------------------------------------------------------|-------------------------------------------------------------------------------|
| results in higher-than-average rainfall for that time of the year | in the suppressed phase, the area receives <b>less than average</b> rainfall. |
|-------------------------------------------------------------------|-------------------------------------------------------------------------------|

An **active phase** is generally followed by  
  
**a weak or suppressed phase,**  
  
in which there is little MJO activity.

### Effective region:-

|                                                                                       |                                                                                                         |
|---------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------|
| is witnessed<br><b>mainly in the tropical region,</b>                                 | As the MJO cycle lasts only <b>30-60 days</b> ,<br>there can be <b>multiple MJO events in a season.</b> |
| in the band between <b>30 degrees North and 30 degrees South</b> of the equator,      |                                                                                                         |
| even though the <b>mid-latitude regions in both hemispheres</b> also feel its impact. |                                                                                                         |
| <b>India falls in this band.</b>                                                      |                                                                                                         |

### MJO and El Nino relation:-

|                             |                                                                                                                                              |                                                                                                                                                      |
|-----------------------------|----------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------|
| There is some evidence that | the <b>MJO</b><br>and<br><br><b>El Nino</b><br>[ – the unusual warming of sea-surface <b>Pacific waters off the South American coast</b> – ] | <b>are correlated.</b>                                                                                                                               |
|                             |                                                                                                                                              | Thus, strong MJO activity, like this year, is witnessed in a year of strong El Nino.<br><br>However, <b><u>the correlation is not exclusive:</u></b> |



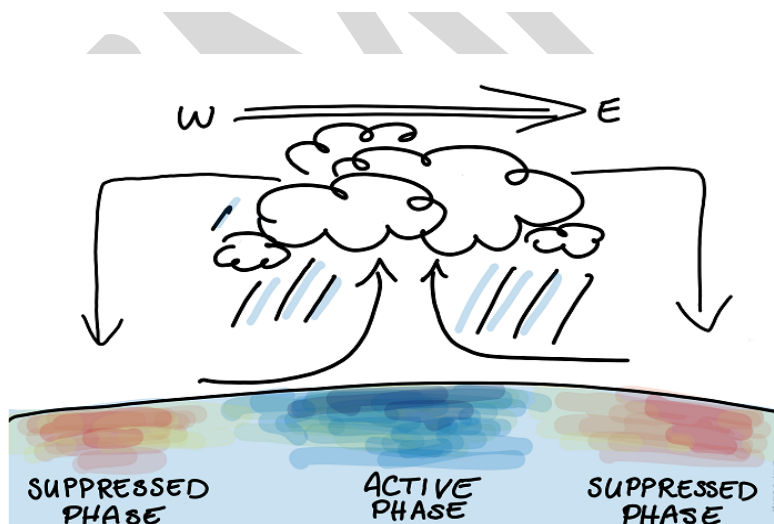
|  |  |                                                                                                                                                                                  |
|--|--|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|  |  | <p><b>a strong El Nino year</b><br/> – the strength being a measure of the increase of temperature of sea surface water – is <u>generally associated with a bad monsoon.</u></p> |
|--|--|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

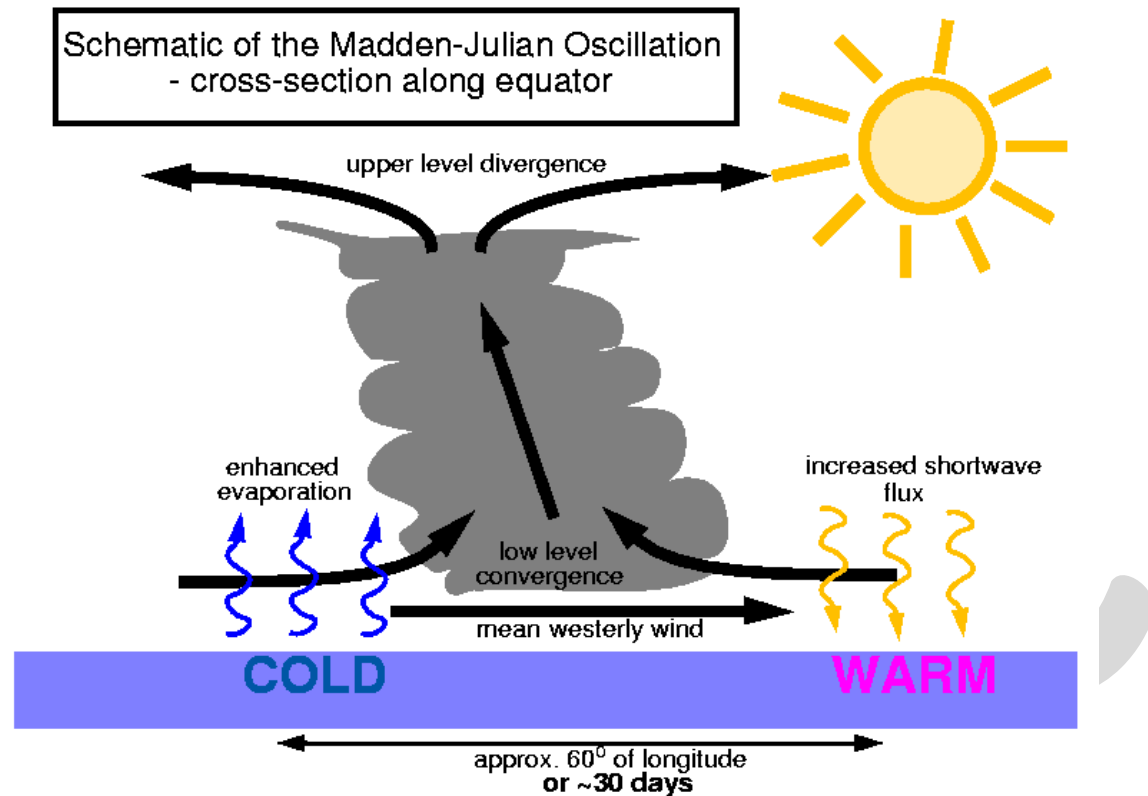
### How did the MJO contribute to the early monsoon onset?

- In the tropics, MJO in its active phase **brings frequent cyclonic activity**, and can initiate the onset of the monsoon.
  - **For instance**, in June **2015**, the MJO resulted in about 20 days of very good rainfall in most parts of the country.
- This is what could have happened **this year** as well. That is because around May 22, the MJO, which had **originated in the Indian Ocean**, was in **Phase 4** with an amplitude greater than 1, which **is indicative of strong rainfall and storms**, according to IMD's extended range forecast.

### What is the MJO?

- An eastward-propagating, equatorially trapped, planetary-scale circulation envelope that drives (and is driven by) tropical convection on timescales of 30-60 days





## **WRONG LESSON PLAN**

### **CBSE's plan for mother-tongue instruction risks diverting attention, resources from far more critical priorities**

Indian education urgently needs to address a range of challenges: Equipping students with future-ready skills, improving learning outcomes and critical thinking skills, integrating artificial intelligence (AI) into classrooms, and closing the gap between academic learning and employability. At this time, the Centre's push to mandate mother tongue-based instruction at the foundational level is potentially misdirected. The Central Board of Secondary Education (CBSE) has instructed schools to map students' mother tongues and design early-grade instructions around them by the end of the summer break. While this move aligns with the National Education Policy 2020 and the National Curriculum Framework for School Education's advocacy of foundational learning in the home language, mother tongue, or regional language at least until Class II, it risks diverting attention and resources from far more critical priorities.

The pedagogical value of foundational literacy in familiar language is well established, but in certain contexts. International models, from Ethiopia to the Philippines, and local experiments, such as Odisha's successful 2006 mother tongue-based multilingual education pilot programme, validate the benefits of this approach. However, these models often operate in relatively homogeneous linguistic settings or are tightly focused on marginalised groups. Applying the same logic uniformly across India's vast multilingual CBSE ecosystem introduces

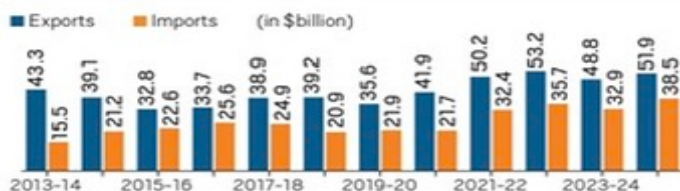
significant complexities. In cities and towns where classrooms host students from a wide array of linguistic backgrounds, the logistics of assigning instructions by mother tongue or home language are deeply problematic. They raise practical questions - how should a classroom with multiple languages be managed? Which language should be prioritised? Trained personnel, multilingual teaching resources and dynamic classroom strategies continue to be in short supply. The result could be inconsistent, confused, and uneven learning experiences – the opposite of what foundational education requires.

The move risks sidelining an even more urgent national conversation: How to adapt the classroom to the realities of rapid technological changes and geopolitical churn. While the world races to integrate AI into pedagogy, enhance digital literacy, and prepare students for jobs that don't yet exist, India's education system is at risk of being bogged down in language politics. For better or worse, English remains the language of aspiration, global communication, and economic mobility for millions of Indian families. An inflexible emphasis on mother-tongue instruction could set back long-term prospects for students, especially those from economically weaker sections for whom an English-medium education remains key to social advancement. In West Bengal, for instance, the Left Front government's rigid implementation of Bengali-medium primary education in government schools in the 1980s left generations with poor English proficiency. This became a disadvantage in white-collar employment, forcing a policy reversal in later years. In a country of India's diversity, any pedagogical shift, especially those directed at early learners, must be well thought out. The CBSE's move, without addressing deeper systemic needs, risks derailing India's educational progress. Policymakers must focus on what matters most: Building a modern, inclusive and intuitive education system that prepares students for the world they will inherit."

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# India's Agricultural Trade

## INDIA'S AGRICULTURE TRADE



## INDIA'S TOP AGRI EXPORT ITEMS (\$ million)

|                     | 2021-22   | 2022-23   | 2023-24   | 2024-25   |
|---------------------|-----------|-----------|-----------|-----------|
| Marine products     | 7,772.36  | 8,077.98  | 7,372     | 7,405     |
| Non-basmati rice    | 6,133.63  | 6,356.71  | 4,573.41  | 6,527.58  |
| Basmati rice        | 3,537.49  | 4,787.65  | 5,843.3   | 5,944.48  |
| Spices              | 3,896.03  | 3,785.36  | 4,248.56  | 4,451.54  |
| Buffalo meat        | 3,303.78  | 3,193.69  | 3,743.26  | 4,060.54  |
| Sugar               | 4,602.65  | 5,770.83  | 2,824.74  | 2,159.4   |
| Fruits & Vegetables | 1,692.48  | 1,791.05  | 2,037.58  | 2,065.39  |
| Processed F&V       | 1,190.59  | 1,417.59  | 1,624.22  | 1,805.76  |
| Coffee              | 1,020.74  | 1,146.18  | 1,286.28  | 1,805.57  |
| TOTAL*              | 50,240.21 | 53,153.55 | 48,821.68 | 51,940.67 |

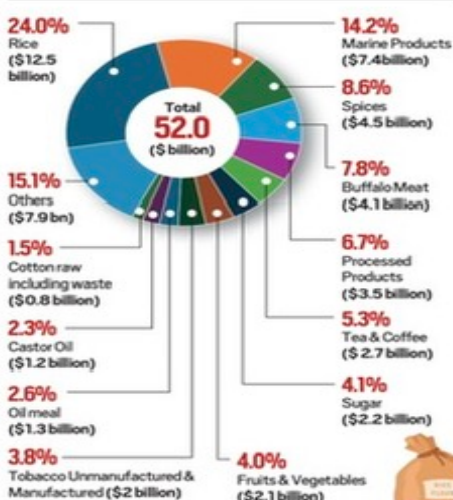
## INDIA'S TOP AGRI IMPORT ITEMS (\$ million)

|                     | 2021-22   | 2022-23  | 2023-24   | 2024-25   |
|---------------------|-----------|----------|-----------|-----------|
| Vegetable oils      | 18,991.62 | 20,837.7 | 14,871.66 | 17,333.14 |
| Pulses              | 2,228.95  | 1,943.89 | 3,746.78  | 5,477.28  |
| Fresh fruit         | 2,460.33  | 2,483.95 | 2,734.97  | 3,043.7   |
| Cashew              | 1,255.46  | 1,805.67 | 1,431.39  | 1,669.43  |
| Spices              | 1,299.38  | 1,336.65 | 1,455.57  | 1,625.42  |
| Sugar               | 169.2     | 292.97   | 1,984.88  | 1,388.1   |
| Raw cotton          | 559.55    | 1,438.69 | 598.66    | 1,219.32  |
| Alcoholic beverages | 693.23    | 797.64   | 1,328.22  | 1,115.51  |
| Natural rubber      | 1,032.71  | 937.6    | 739.18    | 1,069.05  |
| TOTAL*              | 32,422.3  | 35,686.2 | 32,870.03 | 38,509.32 |

Source: Department of Commerce | \* Total includes other commodities not listed in table.

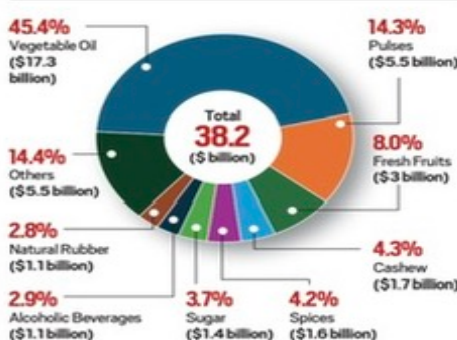
With 55–60 per cent of edible oil consumption met through imports — primarily palm oil, followed by soybean and sunflower — this dependence is excessive and unsustainable. India must pursue a targeted, pragmatic policy focused on domestic oil palm cultivation. Oil palm yields up to four tonnes of oil per hectare, 10 times more than mustard. However, it takes four to six years to mature, during which smallholders face income loss. Government support, equivalent to the opportunity cost of their land (that forgone income from crops), is essential during this gestation phase.

## MAJOR EXPORTING COMMODITIES IN FY25



Source: DGCI

## MAJOR IMPORTING COMMODITIES FY25



**29.05.2025**

## Poverty fell significantly last year. Much of this was driven by GDP growth

**TABLE 1: POVERTY RATIOS USING DIFFERENT CUT-OFFS: ALL INDIA**

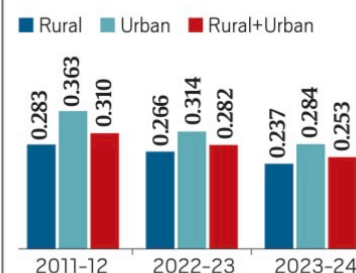
| Poverty Line<br>(PL) Cut-offs | Rural       |             |             | Urban       |             |             | Rural+urban |             |             |
|-------------------------------|-------------|-------------|-------------|-------------|-------------|-------------|-------------|-------------|-------------|
|                               | 2011<br>-12 | 2022<br>-23 | 2023<br>-24 | 2011<br>-12 | 2022<br>-23 | 2023<br>-24 | 2011<br>-12 | 2022<br>-23 | 2023<br>-24 |
| 150                           | 66.6        | 34.8        | 27.8        | 52.8        | 27.8        | 21.7        | 62.6        | 32.8        | 26          |
| 125                           | 51.3        | 20.8        | 14.8        | 40.1        | 16.9        | 11.9        | 48.1        | 19.7        | 13.9        |
| 115                           | 43.5        | 15.8        | 9.9         | 34.7        | 12.9        | 8.8         | 41          | 15          | 9.6         |
| 100                           | 30.9        | 9.6         | 4.9         | 26.8        | 9.3         | 4.8         | 29.5        | 9.5         | 4.9         |
| 85                            | 18.3        | 4.8         | 4.2         | 18.1        | 4.6         | 4.1         | 18.3        | 4.7         | 4.2         |
| 75                            | 11.1        | 4.2         | 3.7         | 12.4        | 4.1         | 3.6         | 11.5        | 4.2         | 3.7         |
| 50                            | 3.9         | 2.8         | 2.5         | 4.3         | 2.7         | 2.4         | 4           | 2.8         | 2.4         |

Note: 1. 100 per cent PL refers to Rangarajan Committee's Poverty Line, adjusted for CPI-based inflation.

2. Rural + Urban data are the weighted average; weights being their respective shares in the estimated persons.

Source: Estimates using Household Consumer Expenditure Surveys of NSSO

**Table 2: Gini Coefficient of Total Consumption Expenditure, All India**



Source: Report No. 592 (HCES 2023-24), National Statistics Office

The World Bank recently released a Poverty & Equity Brief for over 100 developing countries. It says India has significantly reduced poverty over the past decade. Extreme poverty (living on less than \$2.15 per day in purchasing power parity terms) declined from 16.2 per cent in 2011-12 to 2.3 per cent in 2022-23 — more than 170 million were lifted above conditions of extreme poverty in this period. The number of people below the poverty line criteria for lower-middle-income countries — \$3.65 per day — fell from 61.8 per cent to 28.1 per cent.

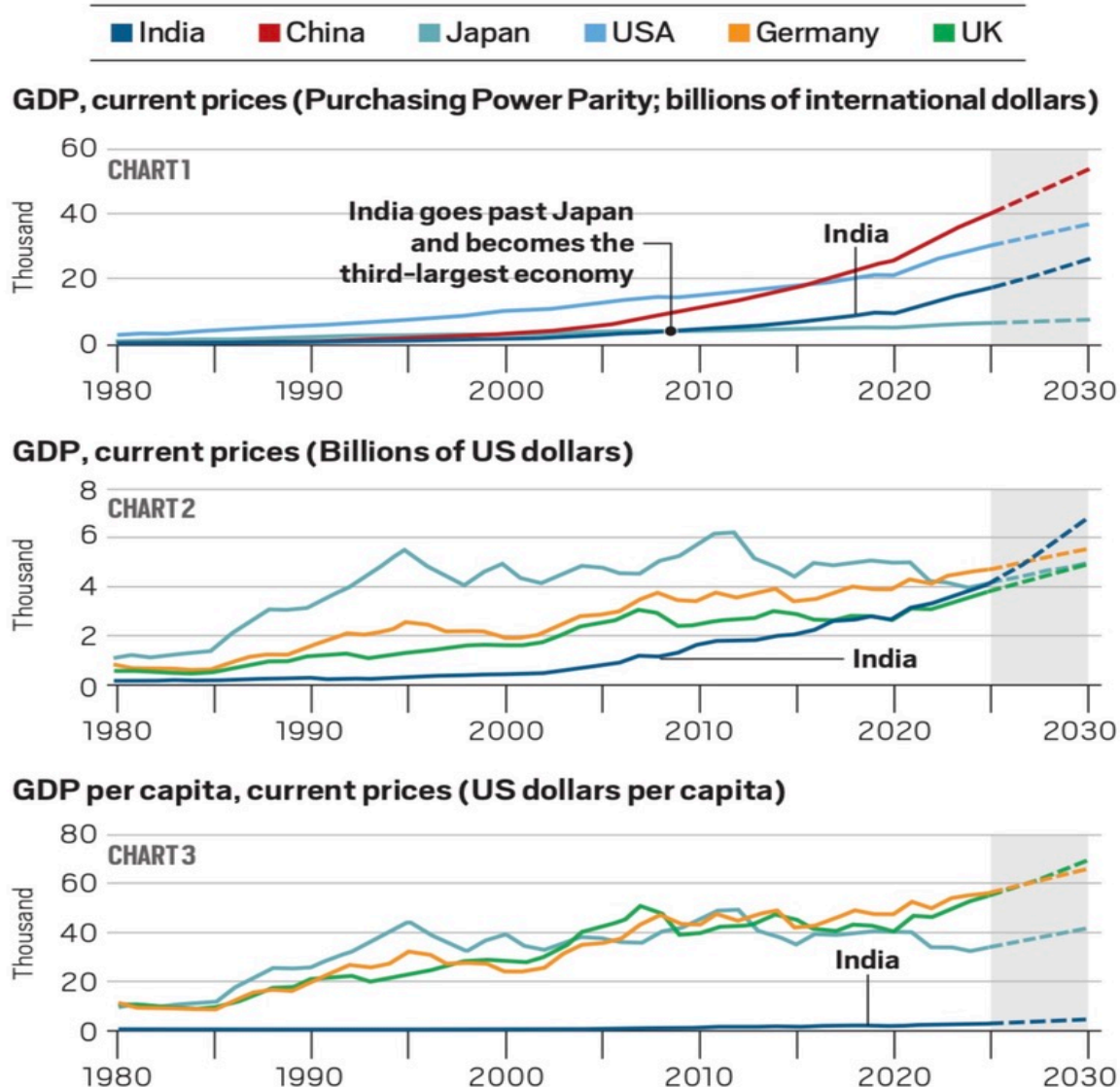


## Size of economy: India vs others

**Has India overtaken Japan to become the world's fourth-largest economy?**

The answer depends on how you look at the data. It is also crucial to look at the condition of the average Indian, rather than aggregate numbers

### GDP numbers, seen in different ways



Source: World Economic Outlook



- ▽ NITI AAYOG CEO Bv Subrahmanyam on Sunday said India had overtaken Japan to become the world's fourth-largest economy, citing data from the International Monetary Fund (IMF).
- ▽ Subrahmanyam's statement triggered self-congratulatory elation among some, even as it provoked skepticism among others, some of whom claimed – also citing IMF data – that India is still the world's fifth-largest economy.

## No. 4, No. 5, No. 37

### ➤ GDP at current prices :-

#### Chart 1

shows India's GDP at current prices (Purchasing Power Parity in international dollars) **overtaking Japan's in 2009.**

- The group of several other countries, including Germany, the UK, France and Brazil (not shown in chart) are bunched around (or below) that of Japan.

|                                                                                                                        |
|------------------------------------------------------------------------------------------------------------------------|
| How is this calculation, which shows <b>India</b> becoming the <b>third largest economy</b> as early as in 2009, done? |
|------------------------------------------------------------------------------------------------------------------------|

|                                                              |
|--------------------------------------------------------------|
| And why has this apparent 'achievement' not been advertised? |
|--------------------------------------------------------------|

|                                                                                |
|--------------------------------------------------------------------------------|
| The reasons lie in the <u>economics and politics</u> of these rankings of GDP. |
|--------------------------------------------------------------------------------|

### ➤ Nominal GDP :-

#### Chart 2

shows India **overtaking the UK in nominal GDP** terms **soon after the Covid pandemic.**

- Germany was then the world's fourth-largest economy, and Japan was at No. 3.

The chart also shows that as of the *end of 2024*, **India was still behind both Japan and Germany.**

- But the **IMF's projection** (dotted lines) is that it is **only a matter of time** before India **overtakes both Japan and Germany.**

- Importantly, the nominal GDP plotted in Chart 2 is in **US dollar terms**. This creates **at least two problems**.

|                                                                                                                                                                                                     |                                                                                                                                                                                                                                                                                                                                                                                                                             |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <p>1) <b>India's GDP</b>, even when it is counted in Indian rupees,</p> <p><b>undergoes several revisions</b></p> <p>as <b>more and better-quality data</b> become available to the government.</p> | <p>2) <i>converting India's GDP from rupees to US dollars</i> → <b>requires the exchange rate</b>, → which <b>keeps fluctuating</b> over time.</p> <p>Thus,</p> <p>if the <b>rupee weakens</b> against the dollar</p> <p>while</p> <p>the <b>yen strengthens</b> against the dollar,</p> <p>the <b>relative positions</b> of India and Japan <b>can change</b> even if the underlying GDPs of the two countries do not.</p> |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

|                               |                                                                                       |
|-------------------------------|---------------------------------------------------------------------------------------|
| IMF's GDP Calculation         | nominal GDP comparisons miss out on the purchasing power aspect.                      |
| <b><u>based on PPP,</u></b>   |                                                                                       |
| <b><u>not nominal GDP</u></b> | It is for this reason that the IMF calculates GDP based on 'Purchasing Power Parity'. |

## Looking beyond India

- In **nominal GDP terms** (Chart 2), the **Indian economy – which has grown at 6%-7% annually on average since 2004** – has taken giant strides.
- But to get a complete picture, one must also look at the trajectory of the economics that India has overtaken or is in the process of overtaking.

➤ **Barring the US and China,**

almost all Western developed economies have largely stagnated since the Global Financial Crisis of 2008.

- **Japan is the extreme case:** its annual GDP in 2025 is projected to be lower than what it was in 1995 – 30 years ago.

➤ It is easier to claim credit in nominal GDP terms.

- But **in PPP terms**, **India's relative position has not improved since 2009.**

### Reality check

| Summary understanding<br>(Chart-3) |                                                                                                                                                                            |
|------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| PER CAPITA                         | <p>India's <b>overall/aggregate nominal GDP</b> has <b>surpassed UK's in 2021</b></p> <p>BUT</p> <p>Nominal <b>per capita GDP difference</b> is around <b>\$44,000</b></p> |
| Growth                             | <p>between 2021-2025</p> <p>UK -<b>\$8,000</b>. India - <b>\$600</b></p>                                                                                                   |
|                                    | <p><b>India's nominal per capita GDP</b> in Indian currency is only <b>Rs 2.3 lakh per annum</b></p>                                                                       |

➤ Chart 3 → maps per capita nominal GDP.

Here, India scrapes the bottom compared to developed economics.

In 2021, India overtook the UK in aggregate nominal GDP terms.

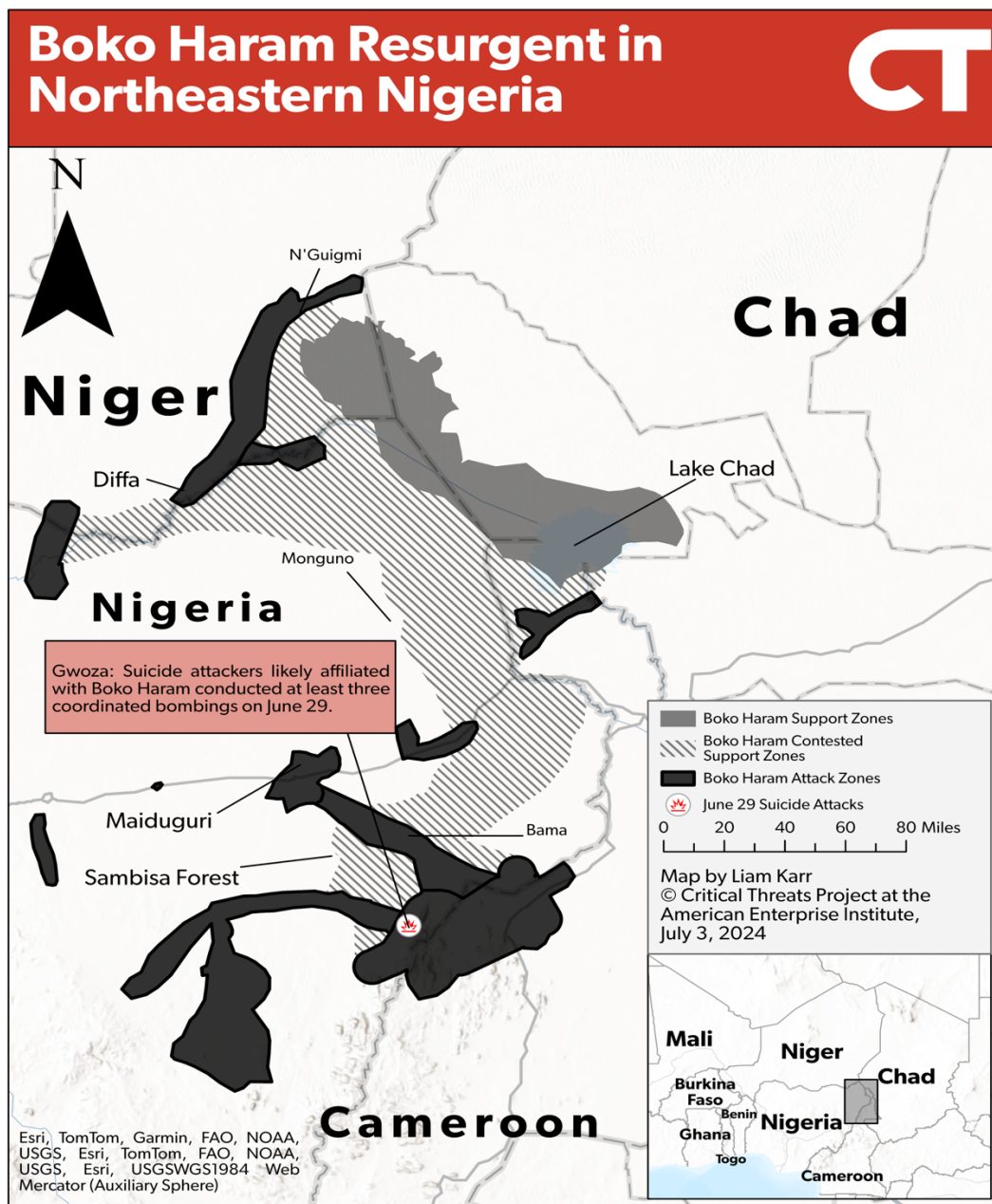
However, in 2021, India's nominal per capita GDP was \$2,250, and the UK's was \$46,115.

➤ Since then, India's overall nominal GDP has been higher than the UK's every year. But as of 2025-end, the UK's nominal per capita GDP is expected to be \$54,949, and India's \$2,879.

➤ In other words, even as India's overall nominal GDP has been progressively higher than the UK's, per capita incomes in the UK have gone up by more than \$8,000 between 2021 and 2025, compared to around \$600 in India.

- Another number that should provide perspective: India's nominal per capita GDP in Indian currency is only Rs 2.3lakh per annum.

## **WHY NIGERIA IS WITNESSING A RESURGENCE OF BOKO HARAM**



A Resurgence of Boko Haram attacks is shaking **Nigeria's northeast**, as Islamic extremists have repeatedly overrun military outposts, mined roads with bombs and raided civilian communities since the start of the year.

This has raised fears of a possible return to peak Boko Haram-era insecurity despite the military's claims of success.

|                                    |                                                                                                     |
|------------------------------------|-----------------------------------------------------------------------------------------------------|
| <b>Boko Haram,</b>                 | to <u>fight western education</u><br><br>and<br><u>impose their radical version of Islamic law.</u> |
| Nigeria's homegrown <b>ihadis,</b> |                                                                                                     |
| took up arms in <b>2009</b>        |                                                                                                     |

The conflict has spilled into Nigeria's northern neighbours and resulted in the death of around 35,000 civilians and the displacement of more than 2 million others, according to the United Nations.

In the latest attack last week in the village of **Gajibo in Borno state, the epicenter of the crisis**, extremists killed nine members of a local militia that supports the Nigerian military.

## Two factions

Boko Haram has split into two factions over the years.

|                                           |                                                                                                                                                                         |                                                                              |                                                                                                                                          |
|-------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------|
| One is <b>backed by the Islamic State</b> | is known as the Islamic State West Africa Province ( <b>ISWAP</b> ).                                                                                                    | The other faction, Jama'atu Ahlis Sunna Lidda'awati Wal-Jihad ( <b>JAS</b> ) |                                                                                                                                          |
| <b>Attacks Military</b>                   | It has become notorious for targeting military positions and has overrun the military on at least 15 occasions this year, <b>killing soldiers and stealing weapons.</b> | <b>Attacks Civilians</b>                                                     | has increasingly resorted to attacking civilians and perceived collaborators, and <b>thrives on robberies and abductions for ransom.</b> |

**31.05.2025**

## **WHY ARE MEN TALLER THAN WOMEN? New STUDY FINDS A GENETIC CLUE**

- ▽ Men are taller than women, by an average of about 5 inches. But why?
  - It's not a genetic inevitability – there are many species in which females outclass males.
- ▽ A new study published Monday in the Proceedings of the National Academy of Sciences **has found a partial explanation**.
  - It involves a gene called **SHOX**, which is known to be associated with height.

### **UPSC's requirement :-**

- ◆ Humans typically have 46 chromosomes in their body cells,
  - organized into 23 pairs.
  - These 23 pairs are located in the nucleus of each cell.
- ◆ males have one X and one Y
- ◆ females have two X chromosomes
- ◆ people with either missing or extra X or Y chromosomes is very rare
- ◆ people with one X and no Y, were known to be associated with health issues – as well as, in this case, short stature
- ◆ researchers found an extra Y did provide more height than an extra X.
- ◆ The biochemistry of the SHOX gene may be the reason.
- ◆ The placement of the SHOX gene is near the end of the sex chromosomes.
- ◆ In females, most genes on one of the two Xs are silenced, or inactive.
  - But one region where the genes remain active is at the very tip of the X.
  - The SHOX gene is close enough to the tip that it is not quite silenced.
- ◆ In men, the X, with its SHOX, is fully active. So is the Y.
  - This means that a woman, with her two X chromosomes, will have a slightly lower dose of the SHOX gene than a man, with an X and a Y.
  - As a result, males get a slightly bigger SHOX gene effect.
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**If too much interested then can read the herebelow, but irrelevant for UPSC**

### **SHOX: present in both sexes...**

- SHOX is present on both the X chromosome (females have two X chromosomes) and the Y chromosome (males have one X and one Y). If it were to explain the height difference between males and females, SHOX would need to have a different effect on each chromosome.
- To investigate this hypothesis, researchers asked if an extra Y chromosome boosted a person's height more than an extra X chromosome.
- There are rare conditions in which people are born with an extra X or an extra Y, or have a missing X or Y. To find people with these conditions, researchers plumbed data from three biobanks, one from Britain, and two from the US.
- Looking at nearly a million individuals' data, the researchers were able to find 1,225 people with either missing or extra X or Y chromosomes. Some of these conditions, like in people with one X and no Y, were known to be associated with health issues – as well as, in this case, short stature.
- And, researchers found, an extra Y did provide more height than an extra X. Their hypothesis was thus borne out.

### **...But more active in males**

- The biochemistry of the SHOX gene may be the reason.
- Matthew Oetjens, a genetics researcher at Geisinger College of Health Sciences in Danville, Pennsylvania, and senior author of the study, explained.
- The placement of the SHOX gene is near the end of the sex chromosomes. In females, most genes on one of the two Xs are silenced, or inactive. But one region where the genes remain active is at the very tip of the X. The SHOX gene is close enough to the tip that it is not quite silenced. In men, the X, with its SHOX, is fully active. So is the Y.
- This means that a woman, with her two X chromosomes, will have a slightly lower dose of the SHOX gene than a man, with an X and a Y. As a result, males get a slightly bigger SHOX gene effect.
- That, the researchers calculated, accounts for nearly a quarter of the average difference in height between men and women. Oetjens said that other features of male sex hormones account for most of the rest of the difference, and other genetic factors are thought to play a role.
- The work is “definitely cool,” said Eric Schadt, a professor in the department of genetics and genomic science at Mount Sinai School of Medicine in New York City. He said: “It is a great use of these biobanks to uncover what is still somewhat of a mystery... Even though the effect is modest, it does explain 20% or so of the height difference”.

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## **Pak to upgrade ties with Afghanistan, appoint ambassador**

Pakistan on Friday announced to upgrade its diplomatic ties with Afghanistan and **appoint an ambassador to the country**, a major indicator of improvement in ties between the two neighbours.

Pakistan had tacitly applauded the capture of Kabul by Taliban in 2021 with the hope that the regime would address its security concerns but it proved otherwise and cross border attacks by the Tehreek-e-Taliban Pakistan (TTP) militants increased manifolds.

The ties plummeted as a result and Islamabad began accusing Kabul of providing sanctuaries to the TTP rebels while demanding action against them.

The breakthrough in ties came through the trilateral mechanism of talks involving Afghanistan, China and Pakistan when the foreign ministers of the three nations met this month in Beijing. It is believed that China played a key role in sorting out differences between Pakistan and Afghanistan and the two agreed to upgrade diplomatic presence in their capitals.

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### **Summary understanding:-**

#### **Pak supported Taliban capture in 2021**

- Pakistan had tacitly applauded the capture of Kabul by Taliban in 2021
  - with the hope that the regime would address its security concerns
  - but it proved otherwise and
  - cross border attacks by the **Tehreek-e-Taliban Pakistan (TTP)** militants increased manifolds.

#### **TTP irritant**

#### **China's mediation -Beijing- May,2025**

#### **Pak appointed an ambassador**

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