

9 PM Current Affairs Monthly Compilation

For UPSC CSE mains examination



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Features :

Arranged as per syllabus Topics
Most complete coverage of major
News Papers editorials

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GS Paper 1

Subject: Geography

Topic: Geophysical Phenomena such as earthquakes, Tsunami, Volcanic activity, cyclone etc.

On the Impact of La Nina on Air Quality in India

News: The article discusses the impact of La Nina on Air Quality in India.

A detailed article on **El Nino** can be [read here](#).

Read more about **La Nina** [here](#).

Background:

Monsoon rainfall over India is known to be strongly influenced by El Nino and La Nina events (the alternating warming and cooling of the eastern Pacific Ocean that impacts weather across the world). A new study by Indian researchers has now suggested that even air quality could be influenced by the two weather events.

What does the study say?

It has argued that the unusual air quality in some Indian cities in the winter of 2022 could be attributed to the **record-breaking spell of La Nina** prevailing at that time. This also links the air quality in Indian cities indirectly to **climate change**, which is making El Nino and La Nina more severe.

What are the reasons for bad air quality in Indian cities?

Various meteorological factors play a role in trapping pollutants in the lower atmosphere levels.

These include:

- a. Temperature.
- b. Moisture.
- c. Heaviness in air.
- d. Wind speed and direction.

Situation in North Indian cities: During October to January, northern Indian cities, particularly Delhi, experience very high concentrations of PM2.5.

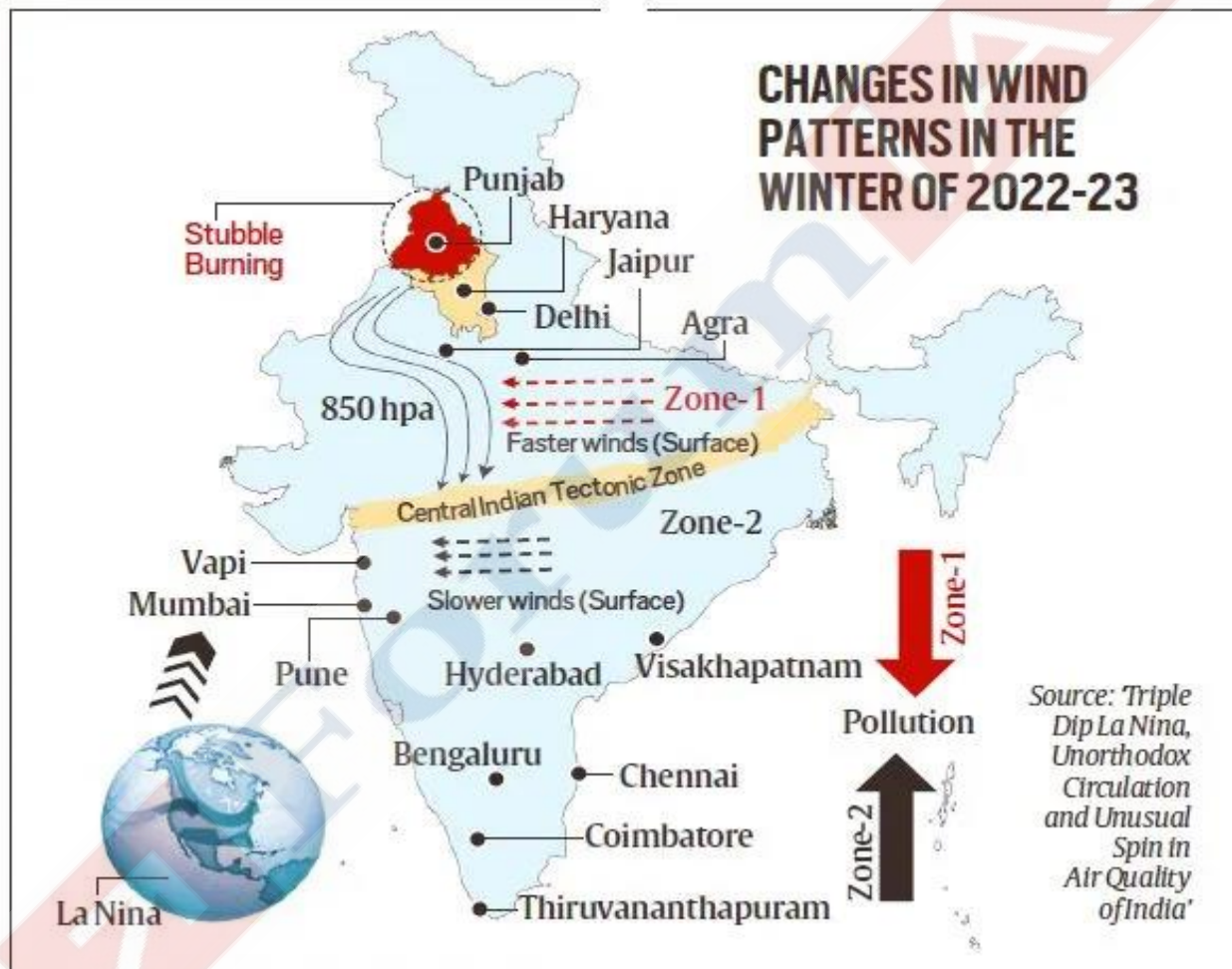
Situation in South Indian cities: The western and southern parts of the country usually have relatively lower levels of pollution, because of their proximity to oceans.

What was the change in the air pollution trend noticed in the winter of 2022?

Northern Indian cities, including Delhi, were cleaner than usual, while cities in the west and the south, like Mumbai, Bengaluru and Chennai, experienced worse-than-usual air quality. It was this unusual behavior that the researchers wanted to study.

What is the explanation given for this?

1) **Change in Wind Direction:** During winter, wind usually blows in the northwesterly direction: for example, from Punjab towards Delhi and further into the Gangetic plains. In the winter of 2022, however, the wind circulation was in the north-south direction. The pollutants being carried from Punjab and Haryana bypassed Delhi and surrounding areas and flew over Rajasthan and Gujarat to southern regions.



Source: Indian Express.

2) **Changed Behavior of Local Circulation near Mumbai:** The local circulation of wind currents near Mumbai alternate between blowing from the land to the sea every few days. In 2022, however, instead of changing direction every 4-5 days, the winds persisted in one direction for more than 7-10 days, leading to greater accumulation of pollutants in Mumbai.

The study says that the wind behavior in both cases was related to the **extended La Nina** which, by the winter of 2022, had been persisting for an unusually long 3 years.

El-Nino: Impact on food inflation in India

News: The article discusses about the likely impact of El-Nino on Indias food inflation.

What is El Niño and La-Nina phenomenon?

- 1) El Nino and La Nina are **complex weather patterns** resulting from variations in ocean temperatures in the Equatorial Pacific Region. They are opposite phases of the **El Nino-Southern Oscillation (ENSO) cycle**.
- 2) El Nino is a climate pattern that describes the **unusual warming** of surface waters in the **eastern tropical Pacific Ocean**. It is the “**warm phase**” of a larger phenomenon called the El Nino-Southern Oscillation (ENSO). It typically lasts **9 to 12 months**.
- 3) La Nina, the “**cool phase**” of ENSO, is a pattern that describes the unusual cooling of the tropical eastern Pacific. LA Nina events may last between **1 to 3 years**.

What is the impact of El Niño phenomenon on Indian monsoon?

- 1) **Weakening of Monsoon Winds:** During El Niño years, the trade winds across the Pacific Ocean gets **weakened**. This reduces their ability to **push moisture-laden** air towards the Indian subcontinent. As a result, the monsoon winds over the Indian Ocean and the Arabian Sea weaken, leading to a decrease in the **overall strength of the monsoon**.
- 2) **Shift in Rainfall Patterns:** The regions that receive **abundant rainfall** during the monsoon season may experience **below-average** rainfall, whereas regions that usually receive **less rainfall** may receive **more rainfall**.
- 3) **Delayed Onset and Early Withdrawal:** It can **delay** the onset of the monsoon season in India. Further, it can also lead to an **early withdrawal** of the monsoon, shortening the overall duration of the rainy season.

What are other factors that impact Indian monsoon?

- 1) **Indian Ocean Dipole** -This measures the difference in sea-surface temperatures on opposite sides of this ocean. The IOD has three phases such as Neutral, Positive and Negative IOD. A **positive IOD** leads to **greater** monsoon rainfall and more active (above normal rainfall) monsoon days in the Indian sub-continent while a **negative IOD** leads to **less** rainfall and more monsoon break days (no rainfall).
- 2) **Climate Change**-This has also added to **unpredictability** of Indian monsoon.

What is the significance of receding El Niño for Indian Economy?

- 1) **Boost to agriculture**-Adequate rainfall will ensure healthy farm harvests, leading to enhanced food grain production.

- 2) **Decline in food inflation**-A bumper harvest would ensure that food prices are under control.
- 3) **Strengthening Indian Rupee**-Controlled food inflation would allow India's central bank to control rupee's internal value so that it does not lose its purchasing power.

Topic: Distribution of key natural resources across the world (including South Asia and the Indian subcontinent)

Trading of Water as a Commodity – The future of water

News: The article discusses the issue of the trading of water as a commodity. It also highlights the safeguards regarding access to water established by the Constitution and Supreme Court.

Recently, there have been reports of water being traded as a commodity (like gold, oil). For instance, a futures contract allows buyers and sellers to barter a fixed price for the delivery of a fixed quantity of water at a future date.

What are the concerns with the trading of water as a commodity.?

1. One should not put a value on water as it belongs to everyone and is a public good.
2. If water was traded as a futures commodity, then hedge funds, banks, large industrial and agricultural players would buy into it and marginalize vulnerable sections like small-scale farmers. According to the author, if this happens, water scarcity will become a norm and water will become unaffordable for many.

What is the situation of water scarcity?

Water scarcity is caused by the overuse of groundwater, climate change, a warming planet and rapid migration to already overpopulated large cities.

Globally: The UN 2023 World Water Development Report notes that 26% of the world's population does not have access to safe drinking water.

In India: The World Bank explains that India has 18% of the world's population, but only 4% of its water resources, making it among the most water-stressed in the world.

How do the Constitution and Supreme Court deal with issues of access to water?

1) Constitution:

- a. **Article 262** provides that Parliament may by law provide for the adjudication of any dispute with respect to the use, distribution or control of the waters of any inter-State river or river valley. Hence, **Inter-State Water Disputes Act, 1956** was enacted to deal with complaints by state governments against each other. For instance, Cauvery water dispute between Tamil Nadu and Karnataka.
- b. **Article 39** provides that the state shall direct its policy towards securing that the ownership and control of material resources of the community are distributed to subserve the common good. Water would fall within this category of resources.

2) Supreme Court:

- a. In **Narmada Bachao Andolan v Union of India (2000)**, the Court concluded that water is part of the right to life enshrined in Article 21.
- b. In **A.P. Pollution Control Board II v Prof. M.V. Nayudu (2001)**, the court declared that it is the duty of the state under Article 21 to provide clean drinking water to its citizens.

Thus, a fundamental right for every Indian to access safe and clean water has been established. This may act as the deterrence against pricing water outside the reach of the average Indian.

How is pricing of water determined in India?

Water pricing is determined by states by the respective municipality frameworks. There is no central authority for the regulation of water pricing.

Subject: History

Topic: Modern Indian history from about the middle of the eighteenth century until the present- significant events, personalities, issues

On TN Governor's Remarks on Indian Freedom Struggle

News: The article discusses the Tamil Nadu Governor's remarks on the Indian Freedom Struggle.

Background:

The Tamil Nadu Governor was recently in the news due to a controversy over his interpretation of historical events which led to India's Independence.

What is the controversy?

1. **Minimal Role of the Quit India Movement:** The Governor held that the Quit India movement made little impact on the British decision to leave India.
2. **Key Role of INA and Soldier Mutinies:** It was insecurity felt by the British at Netaji Subhas Chandra Bose forming the Azad Hind Government and its army (INA) and in 1946 by the Naval Mutiny and the Air Force Rebellion.
3. **Lack of Recognition to Netaji Bose:** The Governor feels that Netaji was not given due recognition for his contribution to the country's Independence by the Congress party because of Jawaharlal Nehru and his successors.

According to the author, the Governor can have his own views, but he shouldn't have made them public while holding the office of Governor. He should've exercised restraint.

What is the truth in this interpretation?

1. **Importance of the Loyalty of Indian Soldiers:** It is true that the loyalty of Indian soldiers in the British Indian armed forces was a principal pillar of their rule in India. They were instrumental in the British conquering India.
2. **Key Role of the INA and Royal Naval Mutiny:** Most historians of the national movement acknowledge that the INA and the naval mutiny shook British confidence in the loyalty of the Indian members of their army in India. Hence, the Governor was right in praising Netaji Subhas Chandra Bose's great contribution in achieving Independence.

What are the issues with his interpretation?

Netaji and INA Not Sidelined: Despite ideological differences in leaders of the freedom movement none of them ever denigrated Netaji or the INA. Lawyers among them came together to defend the three officers – Prem Kumar Sehgal, Gurbaksh Singh Dhillon and Shah Nawaz Khan – at their court martial at the Red Fort in 1945-46.

Bhulabhai Desai, a great lawyer, led the defence which included Tej Bahadur Sapru, Jawaharlal Nehru and Kailas Nath Katju.

Subject: Indian Society

Topic: Salient features of Indian Society, Diversity of India

On Uttarakhand's Uniform Civil Code

News: The article discusses the Uniform Civil Code (UCC) in India, focusing on Uttarakhand's plan to adopt it. It's debated for potentially impacting religious freedom and minorities.

What is the Uniform Civil Code (UCC)?

The UCC is a proposition to replace the personal laws, which are based on the scriptures and customs of different religious communities in India, with a common set of laws governing every citizen. For more information [read here](#).

What is happening in Uttarakhand regarding the UCC?

Uttarakhand's government is likely to pass the Uniform Civil Code (UCC) Bill in its ongoing session. A state-appointed panel, led by Justice Ranjana Prakash Desai, drafted the UCC, submitting the final report on February 2. The State Cabinet has approved this report. Specific changes include equal property share for Muslim women, revoking practices like polygamy and iddat, and maintaining current marriage age requirements.

What are the issues of adopting the UCC in Uttarakhand?

1. **Concerns from Tribal Communities:** Tribal groups, making up 2.9% of Uttarakhand's population, have not agreed to the UCC. The Van Gujjar tribe, particularly, is worried about the impact on their customs.
2. **Impact on Religious Freedom:** Critics fear the UCC could infringe upon religious freedoms and minority rights.
3. **Threat to Cultural Diversity:** There are concerns that UCC might dilute India's rich religious and cultural diversity.
4. **National Debate and Precedence:** The state's approach may set a precedent for other Indian states.

What are the different views on implementing the UCC nationwide?

Judicial View on UCC:

1. The Supreme Court, in the **Shah Bano Begum case (1985)**, highlighted the unfulfilled mandate of Article 44 regarding UCC.
2. In **Sarla Mudgal versus Union of India (1995)**, the Court again mentioned the UCC, stressing the complexity due to multiple personal laws.
3. The **John Vallamattom case in 2003** saw the Court reiterating its stance on the need for a UCC.

Despite these observations, **the Supreme Court has refrained from issuing directives to the government, noting law-making is Parliament's domain**, as seen in the 2021-2022 petition dismissals.

4. **On Uttarakhand's UCC Committee:** The Court referred to **Article 162**, highlighting the state's executive power to deal with matters within its legislative competence. It stated that **forming a committee under Entry 5 of the Concurrent List**, which covers personal law matters like marriage, divorce, and adoption, is within the state's authority and not unconstitutional.

Law Commission's View:

1. **21st Law Commission (2018):** Concluded that implementing a Uniform Civil Code (UCC) across India was neither necessary nor desirable at that time. Emphasized the importance of respecting India's cultural diversity and suggested reforming discriminatory practices within existing personal laws instead of a uniform code.
2. **22nd Law Commission (2021):** Showed a different approach by starting to gather public and stakeholder opinions on UCC. This shift indicates a renewed interest in exploring the feasibility and implications of implementing a UCC nationwide.

On Preserving India's Cultural Diversity and UCC – Strike a fine balance, have a just civil code

News: The article discusses how Indian civil laws and Constitution accommodate its cultural diversity. It also highlights the way forward for a UCC that is just.

A detailed article on the **Uniform Civil Code (UCC) Debate** can be [read here](#).

Background:

On February 7, Uttarakhand passed the Uniform Civil Code. Additionally, the Law Commission of India has invited views and proposals from the public about the Uniform Civil Code (UCC).

How do Indian civil laws and Constitution accommodate its cultural diversity?

- 1) **Religious Personal Laws:** Not just Muslims but even Hindus, Jains, Buddhists, Sikhs, Parsis, and Jews are governed by their own personal laws based on their religious identity. **For instance**, even the reformed Hindu Marriage Act, 1955 insists on solemnisation of marriage, through saptapadi (seven steps around fire) and datta (invocation before fire).
- 2) **Regional Differences in Application of Personal Laws:** For instance, Kerala had abolished the Hindu Joint Family in 1975; Muslim marriage and divorces are registered in Bengal, Bihar, Odisha, Jharkhand under the 1876 law, and in Assam under 1935 law.
- 3) **Right to Preserve Cultural Diversity:** The fundamental right in Article 29(1) is dedicated exclusively to conserving the distinctive culture of all citizens.
- 4) **Indian Model of Secularism:** India decided not to adopt the French model of laïcité, which strictly prohibits bearing any religious outfit or marker in public and considers religion in public as a threat to the nation's secular fabric.

However, according to the authors, India's quest of preserving its multicultural diversity is sometimes antithetical with values such as secularism. State assistance to minority cultures has also been seen as 'appeasement of minorities.'

What should be the way forward for a just UCC?

- 1) **Ensure Multiculturalism:** Law Commission must remember that for a diverse and multicultural polity such as India, the proposed UCC must represent India's 'mosaic model' of multiculturalism. **Note:** Mosaic Model describes a society in which cultural groups live and work together maintaining their unique heritages while being included in the larger fabric of society.
- 2) **Removal of Discriminatory Personal Laws:** Cultural diversity cannot justify continuation of unjust and discriminatory personal laws. Such provisions of the personal laws must go.
- 3) **Bottom-Up Reform:** Since each religious group has cultural autonomy, it is argued that the community should itself come forward to seek reforms by identifying the discriminatory and oppressive issues.
- 4) **Prevent Threat Perception among Communities:** When a community feels threatened in any way, community allegiance becomes much stronger. Therefore, the Law Commission should be accommodative and not contribute to the rise of reactive culturalism amongst different communities in India.

The Law Commission should strike a fine balance as it should aim to eliminate only those practices that do not meet the benchmarks set by the Constitution.

Topic: Population and associated issues

Demographics changes in India - Population growth committee

News: The article is about India's Finance Minister Nirmala Sitharaman announcing a committee in her 2024 budget speech to study India's population growth. This is to help meet the Viksit Bharat goal by 2047.

What is the status of demographics changes in India?

1. **Population Growth:** The fertility rate in India has reached a level where two parents are being replaced by two children, indicating a significant decline.
2. **Workforce Changes:** Data shows that 33% of India's population is aged 20-29 in 2024, but by 2047, the proportion of younger and older working-age populations will both be around 28%.
3. **State Variations:** In 2021, in Bihar, 44 working-age adults supported 100 dependents, while in Tamil Nadu, 50 adults supported the same. By 2051, this is expected to change to 47 adults in Bihar and only 24 in Tamil Nadu.
4. **Women in Workforce:** A study showed that in 1993, women spent about 14 years in childcare, which reduced to eight years by 2021. Yet, this hasn't led to a higher rate of women in the workforce.

What are the challenges of demographics changes in India?

1. **State-Specific Demographic Shifts:** In states like Bihar and Tamil Nadu, demographic changes are distinct. In 2021, Bihar had 44 working-age adults supporting 100 dependents, compared to 50 in Tamil Nadu. This will drastically change by 2051, with implications for economic support.
2. **Underutilized Female Workforce:** Despite the decrease in childcare time (from 14 to 8 years since 1993), women's increased participation in the workforce hasn't materialized, missing the chance to turn a demographic dividend into a gender dividend.
3. **Resource Allocation by the 16th Finance Commission:** The Commission will need to address the varied demographic changes and dependencies across different states, impacting inter-state resource distribution.

What should be done?

1. **Multidisciplinary Approach:** Engage demographers, economists, sociologists, and public policy experts to address the diverse and complex challenges of demographic changes.
2. **Invest in Workforce Skills:** To prepare for a future with more middle-aged workers, India needs to focus on skill development and training, especially for those already in the workforce.
3. **Boost Women's Labor Market Participation:** To convert the demographic dividend into a gender dividend, there should be an increase in women's workforce participation. It can be done, possibly by improving childcare facilities through programs like Anganwadi and MGNREGA.
4. **Prepare for Aging Population:** Policies should be developed to make the elderly more self-sustaining, such as raising retirement ages and enhancing old age pension schemes.

5. **Natural Fertility Decline:** India should avoid strict population control like China's one-child policy. Instead, it should let the fertility rate naturally decrease and adapt to demographic changes.
6. **Resource Distribution:** 16th Finance Commission should focus on allocating resources based on the varying demographic needs and challenges of different states.

Situation of India's population -Population priorities

News: The article talks about a new committee being formed to address issues caused by India's rapid population growth and demographic changes. It also highlights the need for this committee to focus on related challenges, such as job creation and social security.

What is the current situation of India's population?

1. The Total Fertility Rate (TFR) in India has decreased to 2.
2. Some states like Bihar (2.98), Meghalaya (2.91), Uttar Pradesh (2.35), Jharkhand (2.26), and Manipur (2.17) have TFRs above 2.1.
3. The TFR has fallen from 5.7 in 1950 to 2 in 2020, showing significant reduction.
4. Southern States' population share decreased from 26% in 1951 to 21% in 2011, due to rapid TFR reduction.
5. This decrease in TFR is linked to better socio-economic outcomes and education in these regions.

What are the challenges of population changes?

1. **Aging and Urbanization:** The demographic shift and rising life expectancy in India are leading to new challenges in managing an aging population and rapid urbanization.
2. **Employment and Productivity:** With high unemployment and slow creation of non-farm jobs, there's a risk of not fully capitalizing on the demographic dividend.
3. **Social Security:** Adequate social security is crucial for the aging workforce, ensuring support in later years.
4. **Avoiding Distractions:** The committee should focus on these demographic challenges rather than getting sidetracked by issues of religion and immigration, as suggested by the ruling party.

What should be done?

1. **Form a Focused Committee:** Establish a high-powered committee to address issues arising from population growth and demographic changes.
2. **Job Creation and Social Security:** The committee should focus on creating jobs and improving social security, crucial for the working-age population.
3. **Avoid Distracting Issues:** The committee must avoid getting sidetracked by the ruling party's focus on religion and immigration, and instead concentrate on the actual demographic challenges.
4. **Utilize the Demographic Dividend:** Address the challenges to effectively harness the demographic dividend, such as high unemployment and the need for skilled job opportunities.

On the Challenges of the Elderly – Caring for the elderly

News: The article discusses the projections of ageing of Indian population. It highlights the challenges faced by the elderly, and the steps that should be taken in this regard.

Countries such as Italy and China are dealing with the challenge of unfavorable demographics. In India too, an ageing population, coupled with a decreasing fertility rate and increased life expectancy, will replace the country's demographic dividend in the years to come.

What are the projections for India?

Currently, senior citizens (people aged 60 years and above), comprise nearly **10%** of the population (about 104 million).

By **2050**, the elderly population is projected to rise to 319 million, approximately **19.5%** of the total. In this context, **NITI Aayog** has released a paper on senior care reforms in India. It highlights the needs of the senior population, and identifies the deficiencies in regulatory provisions, accessibility, and poor implementation of services in senior care.

What will be the impact?

- a. Shifting disease burden.
- b. Rising dependency ratios.
- c. Evolving family structures.
- d. Altered consumption patterns.
- e. Structural changes in labour markets.

What are the challenges faced by the elderly?

- a) **Disease Burden:** 75% of the elderly suffer from one or more chronic diseases, while 1 in 3 have depressive symptoms and complain of low life satisfaction.
- b) **Lack of proper geriatric illness management.**
- c) **Increased medical expenditure.**
- d) **Inaccessible physical infrastructure.**
- e) **Deficient financial planning.**
- f) **Food insecurity.**
- g) **Loneliness:** This has increased due to a rise of nuclear family systems. For instance, 54% of the elderly women are widows, and 9% of them reside alone.
- h) **Fragmented Social Safety Nets:** 78% of the elderly live without a pension while only 18% are covered by health insurance.

What should be done?

1. **Healthcare Improvements:** Better wellness and therapeutic interventions to strengthen physical and mental health services and emergency response infrastructure.
2. **Use of Technology:** Integrating technology with health care through wearable devices, AI-based smart housing, and a well-developed telemedicine market have huge potential to transform senior lives.

3. **Social Security:** Increasing the coverage of pensions, geriatric health insurance plans, GST reforms on senior care products can bring the elderly within the ambit of a social safety net.
4. **Role of Private Sector:** Private-sector and non-profit voluntary organisations need to step in to fulfil the needs of the elderly. In most countries, the care economy is run by private agents.
5. **Changes in Employment Models:** Increased life expectancies also call for a transition to more flexible working models. Employers should rethink the retirement age to unlock the longevity dividend.

Topic: Secularism

Controversy with the Places of Worship Act-Places of worship and an unsettling judicial silence

News: The article discusses the Supreme Court of India's handling of cases involving religious sites, focusing on the Places of Worship Act, 1991. It mentions challenges to the Act, petitions against mosques, and concerns about secularism and the Act's future.

What is the background of the issue?

1. **Babri Masjid Verdict:** In November 2019, the Supreme Court of India gave a verdict in the Babri Masjid case, awarding the disputed land to the group that demolished the mosque.
2. **Places of Worship Act, 1991:** The Court praised this Act, which aims to preserve the religious character of worship places as of August 15, 1947.
3. **Post-Verdict Petitions:** After the verdict, petitions were filed against mosques in Kashi, Mathura, and others, claiming they were originally Hindu temples.

What is the controversy with the Places of Worship Act?

1. **Act's Objective:** The Places of Worship Act, 1991, aims to maintain the religious character of places of worship as they existed on August 15, 1947.
2. **Challenges to the Act:** There are increasing petitions against mosques, claiming they were built on ancient temples. Examples include petitions against mosques in Kashi and Mathura.
3. **Supreme Court's Involvement:** The Court has allowed some petitions to be considered, challenging the Act's intent.
4. **Concern Over Cut-off Date:** A petitioner suggested changing the Act's cutoff date from 1947 to 1206, questioning the Act's scope.

What are the implications of such controversy?

1. **Threat to Secularism:** The challenges to the Places of Worship Act potentially undermine India's commitment to secularism, as the Act was designed to protect the religious character of places of worship.

2. **Political Implications:** These controversies are influencing political narratives, especially with the upcoming general election in 2024. The petitions and debates are becoming a tool in political agendas.
3. **Legal Precedent:** The Supreme Court's decisions on these matters could set significant precedents for how religious sites are treated legally.
4. **Public Trust and Harmony:** Challenges to the Act and the filing of numerous petitions against mosques risk breaching public trust and could lead to communal disharmony.
5. **Historical Reinterpretation:** The petitions, by questioning historical facts and attempting to change the religious status of sites, could lead to a reinterpretation of history, impacting the collective memory and cultural heritage of the nation.

Way forward

The way forward involves the Supreme Court upholding the integrity of the Places of Worship Act, ensuring secularism and historical preservation. It's crucial to maintain public trust and communal harmony, especially with the looming general election in 2024, where such issues could significantly influence political narratives.

GS Paper 2

Subject: Indian Polity

Topic: Issues and challenges pertaining to the federal structure, devolution of powers and finances up to local levels and challenges therein

Concerns in India's Fiscal Federalism - On irregularities in vertical devolution

News: The article discusses the issues in India's fiscal federalism, focusing on the unfair distribution of tax revenue between the central government and states.

What are the Concerns in India's Fiscal Federalism?

The central government's **increasing retention of tax proceeds**, evident in the rising share of cesses and surcharges, is a key concern in India's fiscal federalism.

This trend contributes to the **shrinking of the divisible pool**, with these collections growing from 11.3% of the gross tax revenue in 2009-10 to 16.3% in 2022-23. States face the challenge of more tied transfers, restricting their spending freedom.

Furthermore, the government's **non-compliance with Finance Commission recommendations** on revenue sharing exacerbates the situation, a point underscored by the Comptroller and Auditor General's (CAG) reports on mismanagement of funds.

For information on the Issues with Fiscal federalism [read here](#)

Why is there shrinking of divisible pool?

1. **Introduction of Cesses and Surcharges:** The central government has been introducing new cesses and surcharges, like the Agriculture Infrastructure and Development Cess in 2021-22, and retaining them exclusively.
2. **Exclusion from Divisible Pool:** These cesses and surcharges are excluded from the net divisible pool, which is the portion of tax revenue shared with states.
3. **Rising Share of Exclusions:** The proportion of tax revenue excluded has increased significantly, from 11.3% of the gross tax revenue in 2009-10 to 16.3% in 2022-23.

What indication has been given by CAG on sharing of resources between the Union and States?

1. **Non-Transfer or Short Transfer of Cesses:** The Comptroller and Auditor General (CAG) highlighted instances where cesses collected were either not transferred or inadequately transferred to designated funds.
2. **Specific Examples of Mismanagement:** For instance, only 60% of the Health and Education Cess collected in 2021-22 was transferred to its reserve fund. Similarly, a small fraction (9.6%) of the Research and Development Cess collected over two decades was transferred to its respective fund.
3. **Large Scale of Discrepancy:** The extent of short transfers is substantial, with billions not reaching the intended funds. This includes shortfalls in the Swachh Bharat Cess and under-transfers in the Road Cess and Clean Energy Cess.

How is the spirit of cooperative fiscal federalism diluting?

1. **Deviation from Finance Commission's Recommendations:** The Union government has not fully adhered to the Finance Commission's recommended sharing rates. For instance, during the 15th Finance Commission period, the share actually devolved was only 38.1%, below the recommended 41%.
2. **Rise in Tied Transfers:** States are receiving more funds tied to specific central schemes, restricting their ability to allocate resources based on local needs.
3. **Credit Usurpation by the Union Government:** There's a tendency of the Union government to take credit for projects, even when states contribute significantly, undermining the partnership principle in fiscal federalism.
4. **Conditionalities on Grants:** Several grants to states are contingent on fulfilling certain conditions, including the insistence on specific labelling, which imposes Union government preferences over state priorities.

What reforms are needed to address these issues?

1. The 16th Finance Commission should compensate states for historical wrongs in devolution.
2. Accurate estimates of "net proceeds" should be published in budget documents.
3. Union government should legislate strict limits on the collection of cesses and surcharges.

Allocation of funds between the Centre and states- On financial devolution among States

News: The article discusses the financial arrangement in India where taxes collected by the central government are shared with states.

What is the basis for the allocation of funds between the Centre and states?

Under Article 270 of the Indian Constitution, a scheme is established for distributing net tax proceeds, collected by the central government, between the Centre and the States. The divisible pool, which includes taxes like corporation tax, income tax, GST, and the Centre's share of IGST, is shared with the states but excludes cess and surcharges. The Finance Commission, formed every five years, recommends how these funds are allocated. The 15th Finance Commission has advised a 41% share from this pool for the states. For information on **Finance Commission** [read here](#)

Now, the basis for allocation includes:

1. **Income Distance:** States with lower per capita incomes receive more to promote equity. The benchmark is the state with the highest per capita income, which is Haryana.
2. **Population:** The 2011 Census data is used for population considerations, moving away from the 1971 Census data used earlier.
3. **Forest and Ecology:** States with larger forest cover get a bigger share, recognizing their ecological contribution.
4. **Demographic Performance:** States that have better controlled their population growth receive more funds.
5. **Tax Effort:** States with higher tax collection efficiency are rewarded with a greater share.

What are the issues with the allocation of funds between the Centre and states?

1. **Exclusion of Cess and Surcharge:** About 23% of the central government's gross tax receipts come from cess and surcharge, which are not part of the divisible pool. For instance, in the 2024-25 budget, the total tax revenue of the Union government is ₹38.8 lakh crore, but states only receive around 32%, less than the recommended 41%.
2. **Variation in Returns to States:** There is a noticeable disparity in what states get back for every rupee contributed. For example, industrially developed states receive less than a rupee for every rupee contributed, compared to states like Uttar Pradesh and Bihar.
3. **Decreasing Share for Southern States:** Over the last six Finance Commissions, the share in the divisible pool for southern states has been reducing due to the criteria focusing more on equity and needs than on efficiency.

What should be done?

1. **Include Cess and Surcharge in Divisible Pool:** Currently, cess and surcharge are not shared with states. Including them in the divisible pool would increase the funds available for states.

2. **Reconsider Efficiency Criteria in Fund Allocation:** Give more importance to the efficiency of tax collection by states in the allocation process, which would encourage states to improve their tax collection systems.
3. **Enhanced State Participation in Finance Commission:** Similar to the GST Council, states could have a more formal role in both forming and working with the Finance Commission, leading to a more collaborative and transparent fiscal federalism.

For more information [read here](#).

On the Issues with Fiscal federalism

News: The article discusses the issues with fiscal federalism in India and suggests a way forward for the same.

Background:

The governments of some states in South India have objected to their share of taxes and the Union government's implementation of fiscal federalism.

Read more - [Fiscal Centralization in India – Explained Pointwise](#)

What are the issues with fiscal federalism in India?

- 1) **Disparity in Revenue Shares:** There are growing disparities between what is paid by states into the exchequer and what is received by some states. This is the complaint of southern states that they are taxed too much compared to poorer and more populous states.
- 2) **Rising Cesses and Surcharges:** In recent years, the sharp growth of cesses and duties (which are not part of the divisible pool of taxes), has led to an expansion of the resources available to the Union at the expense of those of the states.
- 3) **Conditional Transfers:** The Union government also attaches conditions to transfers on account of developmental schemes.

What should be the way forward?

- 1) **Political Solutions:** It must be addressed through skillful coalition building among the governments.
- 2) **Reduction of Borrowing Constraints on States:** The Union government should revisit the borrowing constraints placed on state investment funds, as suggested by Kerala.
- 3) **Reduction in Cesses and Surcharges:** The Union government should reduce the degree to which it uses cesses and duties to expand its share of tax collections.
- 4) **Minimise the discretionary aspect of transfers to states:** Some of these transfers can be made automatic. For other transfers, clear and non-discriminatory methods should be followed.

According to the author, the larger problem of the issues with fiscal federalism can be addressed only through political give and take. Given India's developmental needs, it is important that relations between the Centre and states are cordial.

Kerala's protest against Net Borrowing Ceiling (NBC)-The severe erosion of fiscal federalism

News: The article discusses Kerala's protest against the Indian Central Government's Net Borrowing Ceiling (NBC), which limits the state's borrowing capacity. This restriction impacts Kerala's ability to fund pensions and welfare schemes, leading to claims that it violates the Constitution, prompting legal challenges.

What is the net borrowing ceiling (NBC)?

The Net Borrowing Ceiling (NBC) restricts state borrowings from various sources, such as the open market. To determine this ceiling, the Central Government subtracts state liabilities, including those from public accounts.

Additionally, borrowings by state-owned enterprises, where the principal and/or interest are serviced out of the Budget, or through assignment of taxes or cess or any other State revenue, are also deducted from the NBC.

What are the arguments of the central government and Kerala for NBC?

Central Government's Arguments for NBC:

- a. Relies on Article 293(3) of the Constitution, requiring state consent for loans with outstanding central loans.
- b. Justifies NBC to ensure fiscal discipline and transparency, as recommended by the 15th Finance Commission Report.
- c. Includes state enterprise debts in NBC to prevent off-budget transactions and hidden liabilities.

Kerala's Arguments Against NBC:

- a. Contends that including state enterprise debts, like those of KIIFB, in NBC is constitutionally suspect.
- b. Notes that the 15th Finance Commission Report does not specifically recommend including state enterprise debts in NBC.
- c. Highlights Article 266(2) to argue that public account transactions are under state jurisdiction, questioning their inclusion in NBC calculations.
- d. Emphasizes the Kerala Fiscal Responsibility Act, 2003, arguing that it already ensures fiscal discipline, questioning the need for central intervention.
- e. References Article 202 of the Constitution and Entry 43 of the State List, asserting state control over its public debt and financial affairs, challenging the central imposition of NBC.

What are the implications of NBC?

1. **Restricts State Borrowing:** The NBC constrains states' borrowing capacity, impacting their financial independence.
2. **Impacts Infrastructure:** Kerala's inclusion of KIIFB debts under NBC limits funding for critical infrastructure projects.
3. **Affects Essential Services:** NBC's borrowing restrictions challenge states' ability to fund pensions and welfare schemes.

4. **Fiscal Federalism Concerns:** Kerala perceives NBC as an example of 'annihilative federalism', undermining state autonomy and altering India's federal balance.
5. **Legal Disputes:** Kerala's Supreme Court challenge against NBC underscores constitutional tensions regarding fiscal authority between the Centre and states

Way forward

A balanced approach is essential, where fiscal discipline and state autonomy are both respected. Reassessing the scope of NBC, in line with the 15th Finance Commission's recommendations, becomes crucial. This ensures states like Kerala can effectively manage their finances, uphold constitutional norms, and maintain the spirit of cooperative federalism.

Issue with financial transfers to states-Union government's reins on financial transfers to States

News: The article discusses how the Indian central government has reduced financial transfers to states, increased its own revenue through taxes and surcharges, and is spending more on its schemes rather than distributing funds to states.

What is the issue with financial transfers to states?

1. **Reduced Financial Transfers:** Despite recommendations (from finance commission) for states to receive 42% and 41% of the net tax revenue (revenue after deductions for collection costs, sharing with Union Territories, and cess and surcharges), they actually received a smaller share of the gross tax revenue (total collected revenue before any deductions): just 35% in 2015-16 and 30% in 2023-24.
2. **Growth in Union Government's Revenue:** The Union government's tax revenue more than doubled from ₹14.6 lakh crore in 2015-16 to ₹33.6 lakh crore in 2023-24. However, the states' share doubled from ₹5.1 lakh crore to ₹10.2 lakh crore, indicating a disproportionate increase.
3. **Decrease in Grants-in-Aid:** Direct financial support to states, in the form of grants-in-aid, declined from ₹1.95 lakh crore in 2015-16 to ₹1.65 lakh crore in 2023-24.
4. **Increase in Cess and Surcharge:** The collection from cess and surcharge, which is not shared with states, rose from 5.9% of the Union government's tax revenue in 2015-16 to 10.8% in 2023-24.
5. **Centralisation of Expenditure:** The Union government increased spending on its schemes like CSS and CSec, from ₹2.04 lakh crore to ₹4.76 lakh crore and ₹5.21 lakh crore to ₹14.68 lakh crore, respectively, reducing states' financial autonomy.

What impact does this have on state finances?

1. **Strain on State Budgets:** Due to reduced transfers and grants, states face challenges in financing their programs and initiatives, impacting their ability to deliver public services effectively.
2. **Impact on Less Wealthy States:** Poorer states struggle more due to these financial constraints, exacerbating the inequality between states in terms of financial resources and development capabilities.

3. **Limited Fiscal Autonomy for States:** With the central government's increased control over financial resources, states have less freedom and flexibility in their spending, impacting their ability to address local needs and priorities.
4. **Impact on Fiscal Federalism:** This trend towards more centralised control over finances, with less revenue sharing with states, goes against the principles of cooperative federalism.
5. **Potential Bias in Resource Allocation:** The possibility of the Union government favoring certain states or regions through Central Sector Schemes, due to their complete funding by the central government, raises concerns of unequal treatment among states.

Way forward

To promote balanced fiscal federalism, the Union government should adhere to the Finance Commission's recommendations on revenue sharing. Increasing statutory transfers to states and ensuring equitable allocation of funds across all regions are vital. This approach will enhance states' financial autonomy and support equitable development.

Revised delimitation exercise-Understanding the delimitation exercise

News: The article discusses how constituencies for India's Lok Sabha and state assemblies are drawn based on population. It explains the process of delimitation, which is adjusting the number and boundaries of these constituencies. The article also explores various approaches to this process, including international practices, and suggests a balanced solution that respects both democratic and federal principles.

What is delimitation?

Delimitation is the act or process of fixing limits or boundaries of territorial constituencies in a country to reflect the changes in population.

For more information [read here](#)

What are the challenges with the revised delimitation exercise?

1. **Impact of Census Postponement:** Normally, delimitation based on the 2031 Census would occur, as it would be the first Census after 2026. However, the postponement of the 2021 Census and the approaching year 2026 have accelerated discussions on the upcoming delimitation exercise.
2. **Disparities in Population Growth:** In the federal system, which advocates for equal state representation, states like Kerala and Tamil Nadu, which have effectively controlled population growth, might lose seats to rapidly growing states like Uttar Pradesh and Bihar. This disparity risks creating feelings of unfairness and disenchantment among the effectively managed states, potentially leading to an imbalance in representation.
3. **Debated Options:** There are two key options under discussion. One is to keep the Lok Sabha seats at 543 and reallocate them based on new population data. The other is to increase the seats to 848, ensuring proportional representation for all states. However, the first option may favor more populous states, while the second could result in a too-large Lok Sabha without fully resolving underrepresentation issues for less populous states.

For more information [read here](#)

What are international practices?

1. **In the United States**, the House of Representatives has maintained a fixed number of 435 seats since 1913. The distribution of these seats across states is adjusted after each Census using the '**method of equal proportions**'. This ensures balanced representation despite population changes. For instance, following the 2020 Census, 37 states experienced no change in their seat allocation, Texas gained two seats, while five other states gained one seat each, and seven states lost one seat.
2. **In the European Union**, the EU Parliament, with 720 members, employs '**degressive proportionality**' for seat allocation among its 27 member countries. This method ensures a more equitable representation relative to the population size of each country. For example, Denmark, with a population of around 6 million, has 15 seats, whereas Germany, with a significantly larger population of 83 million, holds 96 seats, demonstrating the varying population-to-seat ratios.

What should be done?

1. **Maintain Lok Sabha Seats:** Keep the number of Lok Sabha seats capped at 543 to prevent disruptions in current state representations and uphold federal principles.
2. **Adjust State Assembly Seats:** Increase the number of seats in state assemblies according to current population trends, but without altering the number of Rajya Sabha seats.
3. **Empower Local Bodies:** Strengthen local governance by significantly enhancing the powers and financial resources of panchayats and municipalities, fostering democracy at the grassroots level.

Financial challenges local government bodies in India- Having panchayats as self-governing institutions

News: The article discusses the financial challenges and potential solutions for local government bodies in India, known as panchayats. It highlights their struggle to generate their own revenue and dependence on state and central government funds, suggesting ways to improve their financial self-sufficiency.

What is the current financial status of Panchayats in India?

Panchayats in India generate only 1% of their revenue through local taxes.

The majority of their income, approximately 95%, comes from grants by the central and state governments.

80% of panchayat revenue is from the Centre and 15% from States.

Tax collection by panchayats decreased from ₹3,12,075 lakh in 2018-19 to ₹2,71,386 lakh in 2021-2022.

Non-tax revenue also saw a decline in the same period, from ₹2,33,863 lakh to ₹2,09,864 lakh.

The allocation for rural local bodies increased from the 10th to the 15th Central Finance Commission (CFC), with amounts of ₹4,380 crore and ₹2,80,733 crore, respectively.

What are the challenges faced by Panchayats in India?

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1. **Lack of Tax Collection Authority:** In several states, gram panchayats lack the authority to collect taxes, while intermediate and district panchayats often don't have this responsibility either.
2. **'Freebie Culture' and Public Resistance:** The reluctance to pay taxes due to a prevalent 'freebie culture' in society poses a significant challenge.
3. **Elected Representatives' Hesitance:** Imposing taxes might affect the popularity of elected representatives negatively, leading to hesitation in enforcing tax laws.
4. **Increased Central Finance Commission Grants:** With substantial increases in allocations from the Central Finance Commission, panchayats show less interest in collecting local revenue.

What should be done?

1. **Educate on Revenue Importance:** Raise awareness among elected representatives and the public about the significance of local revenue generation for panchayat development.
2. **Effective Tax Implementation:** Panchayats should enforce appropriate financial regulations for taxation, including determining tax rates and enforcing collection.
3. **Encourage OSR Activities:** Promote activities that generate **Own Source Revenue (OSR)** like rural business hubs, renewable energy projects, and commercial ventures.
4. **Incentivize Local Revenue Collection:** Implement policies to provide matching grants or incentives to panchayats that successfully raise their own funds.
5. **Transparent Financial Management:** Ensure accountability and transparency in financial matters to build community trust and support for local revenue initiatives.

Decentralization in India-Federalism for development

News: The article discusses how giving more power to local governments in India, similar to what China did, can improve economic growth and political harmony. It emphasizes the need for local control over development strategies and better financial resources for states and local bodies.

Why does decentralization matter?

Decentralization is important because it allows local governments to create development plans that suit their specific needs. This approach can lead to more effective economic development compared to centralized planning, especially in diverse countries like India and China. For more information on decentralization [read here](#)

What are the challenges of decentralization in India?

1. **Political Discrimination:** Different political parties ruling at the state and central levels can lead to unfair treatment of states. For instance, allegations of favoritism in Mumbai's municipal corporation towards ruling party MLAs.
2. **Risk of Inter-State Rivalry:** As India moves towards a national market economy, decentralization should not result in trade barriers between states.

3. **Fiscal Constraints:** States accounted for about 55% of government expenditure but only 38% of tax revenue in 2022-23. Central tax collection practices limit states' share, affecting their financial autonomy.
4. **Centralized Development Schemes:** Centrally-sponsored schemes often dictate state development strategies, reducing local autonomy. In the 2022-23 budget, these grants were about half as large as tax devolution to states.
5. **Inadequate Local Governance Resources:** Municipalities and panchayats lack sufficient access to fiscal resources, hindering their ability to effectively manage local development.

How can Indian states benefit from decentralization?

1. **Tailored Development Strategies:** States can develop strategies based on their unique resources, climate, and demographics, leading to more effective economic growth.
2. **Reduced Economic Disparities:** By focusing on local strengths, like specific crops or industries, states can bridge the economic gap. Decentralization allows for diverse approaches, potentially reducing disparities.
3. **Greater Financial Autonomy:** With more control over financial resources, states can better fund their development projects. Currently, states generate 38% of tax revenues but are responsible for 55% of government expenditure.
4. **Local Political Harmony:** Decentralization can reduce political conflicts by allowing states more freedom from central government's influence, leading to more harmonious state-central relations.
5. **Empowerment of Local Bodies:** Municipalities and panchayats can have more control over local development, addressing specific community needs and attracting employment opportunities.

What can India learn from China's growth?

1. **Regional Competition as a Growth Catalyst:** Post-1992, Chinese provinces, municipalities, and towns independently pursued development, fostering a market economy through regional competition.
2. **Balancing National Market with Local Autonomy:** China's success also involved reform measures to create a common national market. This approach demonstrates how regional competition can benefit national development.
3. **Importance of Localized Economic Experiments:** China's varied economic experiments at regional levels were instrumental in its transformation, suggesting that India could benefit from allowing states to innovate and experiment with development models.
4. **Learning from China's Unified Political System:** Despite China being a totalitarian state, India can adopt its economic decentralization model while respecting its democratic and diverse political framework.

Topic: Functions and responsibilities of the Union and the States

Decline in India's parliamentary practices - The real threat to the 'India as we know it'

News: The article discusses the decline in India's parliamentary practices and growing political division. It highlights concerns over democracy's future, polarized politics, challenges to federalism, questionable defections in politics, and issues with Centre-State relations, emphasizing the need to uphold the Constitution.

What is the current status of India's external or internal dynamics?

External Dynamics:

1. **Global Political Environment:** India remains relatively unaffected by global turmoil, including the ongoing war in Ukraine and tensions in West Asia.
2. **China as a Vigilance Concern:** China is noted as a matter of concern, requiring extreme vigilance, but not posing an immediate threat.
3. **Pakistan's Limited Threat:** Due to its internal problems, Pakistan is not currently seen as a significant threat to India.

Internal Dynamics:

1. **Terror Attacks:** India has fortunately avoided major terror attacks recently.
2. **Internal Security Issues:** Challenges like farmer agitations in Punjab and Haryana, and unrest in the northeast, especially Manipur, are present but manageable.
3. **Communal Violence:** While under control, communal tensions could increase during election years.
4. **Left-Wing Extremist Violence:** Currently low but with potential for revival during election periods.

What are the issues with India's parliamentary democracy?

1. **Decline in Parliamentary Practices:** Recent parliamentary sessions in India have been marked by significant conflicts and a departure from traditional practices, as seen in the divisive final session of the 17th Lok Sabha.
2. **Political Polarization:** The country is experiencing heightened political division, with the Prime Minister accusing the opposition of creating a North-South divide.
3. **Strained Federalism:** There are concerns about the central government overstepping its bounds, impacting state autonomy and federal principles. Opposition-ruled states allege that the central government uses governors to interfere in state affairs, leading to strained relations.
4. **Political Defections:** The trend of engineered defections, notably the Bihar Chief Minister's switch to the BJP, is undermining the democratic process.

What factors are responsible for this situation?

1. **Intense Party Rivalries:** The increasing hostility between the ruling party and the opposition, evidenced by mutual accusations and derogatory language, exacerbates the divide.
2. **Electoral Strategies:** The use of divisive issues like the construction of the Ram Temple in Ayodhya as an election tool fuels polarization.
3. **Manipulation of Democratic Processes:** High-profile defections, such as the Bihar Chief Minister's shift to the BJP, indicate a trend of manipulating political loyalty, eroding democratic norms.
4. **Misuse of Constitutional Powers:** The central government's alleged misuse of governors in opposition-ruled states disrupts the balance of Centre-State relations.
5. **Lack of Adherence to Constitutional Principles:** The deviation from constitutionally mandated practices in government and parliamentary conduct contributes to the current situation.

Way forward

To move forward, India must focus on reinforcing parliamentary practices, fostering political tolerance, and strictly adhering to constitutional principles. Strengthening Centre-State relations and ensuring electoral integrity, particularly regarding political defections, are also crucial steps towards preserving the democratic framework and stability of the nation.

Topic: Statutory, regulatory and various quasi-judicial bodies

Issues with RBI's decision in the PayTM case – Banking laws and regulatory shake-ups

News: The article discusses the issues with RBI's decision in the PayTM case. It also highlights the principles that should be followed by regulatory bodies in such cases.

Background:

Reserve Bank of India (RBI) recently directed the Paytm Payments Bank Ltd (PPBL) to stop onboarding customers with immediate effect, thereby essentially stopping the operations of the PPBL.

What are the issues with RBI's decision in the PayTM case?

- a. There was no formal legal order from the RBI setting out the failures and the justification for the action.
- b. There is no information on whether a hearing took place, PPBL's side of the story and RBI's rebuttal of PPBL's defence is not known.
- c. It is unclear whether due process and rule of law principles were followed by public authorities before imposing punitive actions.

According to the author, a possible reason for lack of transparency in this case can be that it could cause a bank run.

What principles should be followed by regulatory bodies in such cases?

1. **Rule of law:** The term “rule of law” is about equal treatment of everyone, with the same set of laws and fair procedures in the legal process.

2. **Natural justice:** It has two basic elements:

a. No person should be judged without a fair hearing, providing the person the opportunity to respond to the evidence against her.

b. No one should be a judge in her own cause.

A modern market economy requires these concepts to be operational, because arbitrary exercise of state power is unfair and deters private investment.

What should be the way forward?

1) **Revisiting Old Laws:** For instance, in this case, Section 35A of the Banking Regulation Act effectively instructs the RBI to do the things that were done. These old laws need to be revisited.

2) **Modern Law Required:** India needs a modern Banking Regulation Act, one that would ensure that the rule of law and natural justice apply fully in regulatory enforcement matters, whenever authorities engage with financial firms.

Topic: Parliament and State Legislatures - Structure, functioning, conduct of business, powers & privileges and issues

Issues related to opening speeches in the Indian Parliament and State Assemblies - Rescuing grace from disgrace

News: This article discusses how in India, the President and Governors read speeches written by the government at legislative openings. These speeches are long and follow British tradition.

What is the current practice for opening speeches in the Indian Parliament and State Assemblies?

Speeches Written by Government: The speeches for the opening sessions of Parliament and State Assemblies are drafted by the government, not by the President or Governors.

Late Receipt of Drafts: The President and Governors receive the drafts close to the event, making it hard to suggest changes.

Constitutional Provisions:

Article 87 of the Constitution: It mandates the President to address both Houses of Parliament at the beginning of the first session after each general election and the first session of each year.

Article 176 (1) of the Constitution: At the commencement of the first session after each general election to the Legislative Assembly and at the commencement of the first session of each year, the Governor shall address the Legislative Assembly or, in the case of a State having a Legislative Council, both Houses assembled together and inform the Legislature of the causes of its summons.

What issues arise from the current practice?

1. **Lengthy and Tedious Speeches:** The speeches are long and can be tiring for the audience, as noted by President R. Venkataraman.
2. **Limited Personal Input:** Presidents and Governors often receive speech drafts too late for meaningful review or personalization.
3. **Writer-Reader Dichotomy:** There's a disconnect between the government (writer) and the President or Governors (readers) of the speech.
4. **Resistance to Change:** Attempts to reform the practice, like President Venkataraman's suggestion to shorten speeches, have met resistance.
5. **Potential for Interruptions and Controversies:** The lengthy nature of the speeches can lead to interruptions and controversies in the legislative assemblies.

What should be done?

1. **Adopt Shorter Speeches:** Following President Venkataraman's suggestion, inspired by the UK's practice, speeches should be concise, outlining only key policies and legislative agendas.
2. **Timely Draft Reviews:** Allow Presidents and Governors enough time to review and suggest changes to the speeches, avoiding last-minute rushes.
3. **Streamline Writer-Reader Collaboration:** Foster earlier collaboration between the government (writers) and the President or Governors (readers) for better-aligned speeches.
4. **Focus on Legislative Efficiency:** By shortening the speeches, legislative sessions can become more efficient, reducing tedium and potential for interruptions.
5. **Respect Political Civility:** Encourage respect for the speech process to maintain decorum and reduce controversies in legislative assemblies.
6. **Emphasize Clear and Accessible Language:** The positive response to the Governor's speech in Hindi in Bihar, which was well-received and uninterrupted, underscores the importance of delivering speeches in a language that is accessible and resonates with the audience. This ensures effective communication and dignified proceedings in legislative assemblies.

Topic: Appointment to various Constitutional posts, powers, functions and responsibilities of various Constitutional Bodies

The new process for picking Election Commissioners, what led to it

News: The article discusses the issues with the earlier process of appointing Election Commissioners and the Supreme Court's ruling regarding this. It also highlights issues with the current method of appointment.

A detailed article on **Appointments to the Election Commission** can be [read here](#).

Background:

The new Election Commissioner will be picked through a consultative process being adopted for the first time after a Supreme Court verdict and a new law.

What were the issues with the earlier process of appointing Election Commissioners?

1. The power to make appointments rested exclusively with the Executive (the Union government).
2. **Article 324(2)** specifies the President's role in appointing Election Commissioners, with the caveat that this appointment is subject to any law passed by Parliament. However, governments had not enacted such a law. Thus, the current appointment system was opaque and raised doubts about the institution's independence.

What was the Supreme Court's ruling regarding this?

The Court observed that it was evident that the founding fathers of the Constitution did not want the Executive to have exclusive authority in appointing Election Commission members. It ruled that "the appointment shall be made on the advice of a Committee consisting of the PM, the Leader of the Opposition of the Lok Sabha (or the leader of the largest opposition Party in the Lok Sabha in terms of numerical strength), and the CJI." However, the Court was careful to specify that these norms were "subject to any law to be made by Parliament".

What have been other recommendations in this regard?

- 1) **Dinesh Goswami committee:** It had recommended that the President consult the CJI and the Leader of the Opposition, or the leader of the largest Opposition group, for appointing the Chief Election Commissioner. For the other two Election Commissioners, the consultation was to involve the CJI, the Leader of the Opposition, and the Chief Election Commissioner.
- 2) **Law Commission's 255th report:** It suggested that a 3-member collegium or selection committee, comprising the PM, the Leader of the Opposition or the leader of the largest Opposition party in the Lok Sabha, and the CJI should be consulted.

What is the current procedure because of the SC judgment?

The Centre introduced a Bill in Parliament last year which establishes a **committee** comprising the **Prime Minister**, the **Leader of Opposition in the Lok Sabha**, and a **Cabinet Minister** nominated by the PM.

The selection will be made from 5 names shortlisted by a screening panel headed by the Law Minister and comprising 2 Union secretaries.

What issues remain plague the new appointment process?

The appointment process raises concerns regarding its potential to undermine the reforms sought by the Court. For instance, the proposed committee's composition effectively sidelines the Leader of Opposition, who could be consistently outvoted by the PM and the union minister.

Topic: Indian Constitution- historical underpinnings, evolution, features, amendments, significant provisions and basic structure

Significance of 'We the People' in the Constitution - The path towards a pluralist civil society

News: The article discusses a debate in India about missing words 'Socialist' and 'Secular' in the Constitution given to Parliament members. It emphasizes the importance of 'We the People' and criticizes elite dominance in public debates.

What is the significance of 'We the People' in the Constitution?

1. **Located in the Preamble:** The phrase 'We the People' is prominently featured in the Preamble of the Indian Constitution, setting the tone for its contents and intentions.
2. **Representation of Popular Sovereignty:** 'We the People' in the Indian Constitution represents the idea that power and sovereignty reside with the people, not just the government or specific groups.
3. **Root of Constitutional Promises:** It anchors the Constitution's goals of securing justice, liberty, and equality for all Indian citizens, as stated in the Preamble.
4. **Support for Non-Elite Movements:** Movements like the farmers' protests and actions against caste-based violence show how marginalized groups use the spirit of 'We the People' to assert their rights and participate in democracy.
5. **Contrast to Elite Dominance:** While public discourse is often dominated by elite groups, 'We the People' signifies the need for inclusive participation from all social segments.

What role do the elite play in public discussions?

In India, the elite, often well-educated and from higher social classes, dominate public discussions, overshadowing marginalized voices. Their control in media, academia, and activism leads to a skewed representation, mostly male and upper-class. Emulating Western discourse, they sometimes dismiss grassroots movements as irrational, lacking diverse perspectives and broader societal context.

What were the views of Ambedkar and Gandhi on the Constitution?

Ambedkar's Views on the Constitution:

1. **Integration of Principles:** Ambedkar saw the Constitution as embracing liberty, equality, and fraternity as interlinked principles of life.
2. **Critique of Legal Reliance:** He cautioned against relying solely on laws for liberty or equality, highlighting the importance of societal morality.
3. **Balance of Values:** Ambedkar emphasized that liberty, equality, and fraternity cannot be separated and must balance each other to prevent dominance by a few.

Gandhi's Views on the Constitution:

1. **Swaraj - Self-Realization:** Gandhi's concept of 'Swaraj' was not just about political independence but a deeper self-realization leading to substantive freedom and equality.
2. **Satyagraha as a Path:** He saw 'satyagraha', or non-violent resistance, as a means to achieve Swaraj, focusing on truth and love.
3. **Personal Sovereignty:** Gandhi viewed sovereignty as not just a state's power but as an everyday practice by individuals, emphasizing personal responsibility and ethical conduct.

Way forward

The way forward involves embracing a pluralistic civil society where every community, particularly non-elite groups, actively participates. It requires fostering dialogue and understanding across various social strata, recognizing grassroots movements as vital expressions of democracy. This approach aligns with Ambedkar's vision of constitutional morality and Gandhi's concept of Swaraj, promoting a more equitable and representative democratic society.

Topic: Salient features of the Representation of People's Act

On Fixing the Issues with India's Electoral Funding

News: The article discusses the concerns raised over corporate donations. It also suggests reforms with respect to electoral funding in order to ensure the integrity of India's elections.

A detailed article on the **Electoral Bonds Scheme Verdict** can be [read here](#).

Background:

The Supreme Court recently struck down the electoral bonds scheme. This has brought to attention the framework regulating corporate contributions to political parties.

What are electoral bonds?

Electoral bonds are interest free "bearer instrument". (Bearer instruments are similar to promissory notes. These are payable to the bearer on demand.

What was the rationale behind electoral funding by corporates?

Rising Expenditure for Fighting Elections: The rising electoral expenditure could not be met through individual contributions. Hence, the government proposed Companies Act be amended to provide the mechanism and a limit (Rs. 25,000) for companies to donate. After a brief ban, corporate donations were again allowed in 1985.

What were the concerns raised over corporate donations?

Corporate donations for electoral funding could lead to:

1. **Control over Corporates:** The government could force a business house into donating to a party.
2. **Unethical Favours and Corruption:** Businesses may seek advantages for themselves by donating to

the ruling party in the hope of compensation in the future. This will corrupt political life and negatively affect India's democracy.

What should be the way forward?

Regulating electoral finance requires rethinking on the following issues:

- 1) **Repeal Expenditure Limits:** India has a limit on how much a candidate can spend on poll campaigns. However, there is a lack of effective enforcement mechanisms for ensuring adherence. **ECI and National Commission to Review the Working of the Constitution (NCRWC)** have held that these expenditure limits are hardly followed and should be repealed.
- 2) **Build a Donor Database:** A living database of political contributions should be developed. This will bring transparency regarding a party's support and lead to better-informed electorate.
- 3) **Information in User-Friendly Format:** Currently, parties do not share information about donations they receive in a machine-readable format, but in the form of scanned PDF files. This makes it difficult to analyse.
- 4) **Empowering Election Commission (ECI):**
 - a. **Infusion of Resources:** ECI's institutional budget is roughly only Rs. 300 crore, with which it has to conduct free and fair elections for the world's largest democracy.
 - b. **Independent Secretariat:** For officers to be insulated from political pressure and state interference, ECI should have an independent secretariat. It would allow it to control its personnel's recruitment and service conditions better.
 - c. **Expenditure of ECI to be 'Charged':** A way to strengthen ECI's independence is to ensure its expenditure is "charged". It would give it parity with Supreme Court, CAG and UPSC.

Note: **Charged expenditure** are those on which no voting takes place for the amount involved in these expenditures for their withdrawal from the Consolidated Fund of India.

According to the author, transparency of political donations and an independent election commission are key to ensure integrity of India's elections.

Subject: Governance

Topic: Government policies and interventions for development in various sectors and issues arising out of their design and implementation

Internet Suspensions in India - The great Indian Internet shutdown

News: The article discusses how the Indian government frequently shuts down the internet, which violates a Supreme Court ruling and negatively impacts the economy and public trust.

What was Anuradha Bhasin judgment?

1. **Recognition of Internet as a Fundamental Right:** The Anuradha Bhasin judgment, in January 2020 by the Supreme Court of India, declared that access to the Internet is a fundamental right under the Indian Constitution.
2. **Context of the Judgment:** This decision came from the case Anuradha Bhasin vs Union of India, which was in response to internet restrictions in Jammu and Kashmir.
3. **Conditions for Internet Restrictions:** The Court ruled that any government restriction on internet access must be temporary, lawful, necessary, and proportionate.
4. **Review of Restrictions:** The ruling emphasized that government orders to restrict internet access are subject to judicial review.
5. **Expectation of Limited Suspensions:** The judgment was expected to limit internet suspensions to extreme cases involving public emergencies or safety threats.

What actions have been taken by the Parliament in relation to internet suspensions in India?

1. **Amendment to Telecom Suspension Rules in 2020:** The Indian Parliament amended the Telecom Suspension Rules, 2017, following the Supreme Court's judgment. This amendment limited Internet suspension orders to a maximum of 15 days. The amendment did not mandate the publication of suspension orders, nor did it include the Supreme Court's direction for periodic review of these orders.
2. **Non-Statutory Recognition of Court Rulings:** The government has not given statutory recognition to the Supreme Court's directives in the Anuradha Bhasin judgment, leading to a lack of awareness and compliance among officials.

What is the issue with internet suspensions in India?

1. **Violation of Supreme Court Ruling:** Despite the Anuradha Bhasin judgment declaring internet access a fundamental right, India frequently imposes internet shutdowns.
2. **Lack of Transparency in Suspension Orders:** The government often fails to publish the reasons for internet shutdowns, undermining legal processes and public trust.
3. **Challenges in Legal Redressal:** Without publicly available suspension orders, it's difficult for citizens to challenge shutdowns in court.
4. **Non-Compliance Across India:** Compliance with the Anuradha Bhasin judgment is low nationwide, not just in Jammu and Kashmir.

What are the impacts of internet suspensions in India?

1. **Economic Losses:** In 2020, India suffered a \$2.8 billion economic loss due to 129 internet suspensions.
2. **Effect on Individuals:** Around 10.3 million people were affected by these shutdowns.
3. **Disruption in Daily Life:** Internet suspensions hinder access to information, healthcare, education, and livelihood opportunities.
4. **Psychological and Social Impact:** They cause psychological stress and hinder social and journalistic activities.
5. **Exacerbates Inequality:** The majority of users rely on mobile data (97.02% as per 2019 TRAI report), so suspensions disproportionately affect those without broadband access.

6. **Undermines Democracy:** Internet shutdowns are often used to suppress democratic exercises like protests, limiting freedom of expression and access to information.

Way forward

The way forward includes more faithful compliance with the Supreme Court's guidelines by the executive government. This adherence is essential for maintaining transparency in issuing and publishing suspension orders, which is crucial for upholding fundamental rights. Such steps will also contribute to reducing economic losses and shedding India's tag as the "internet shutdown capital" of the world, thereby fulfilling the potential of Digital India.

Topic: Important aspects of governance, transparency and accountability

On Electoral Bonds Scheme Verdict – Supreme Court's electoral bonds verdict turns back the clock

News: The article discusses the recent Supreme Court verdict on electoral bonds.

A detailed article on the **Electoral Bonds Scheme Verdict** can be [read here](#).

Background:

The Supreme Court (SC) struck down the **Electoral Bonds (EB) Scheme (2018)**, by holding all the amendments made in the Representation of People Act (RPA), the Companies Act (CA) and the Income Tax Act (ITA) violative of the **fundamental right to information under Article 19(1)(a)** and the **right to equality (Article 14) of the Constitution**.

What were the provisions?

- 1) **Exclusion from Reporting to ECI:** The amendment in RPA excluded the EBs from the requirement of mandatory reporting by political parties to the Elections Commission of India (ECI).
- 2) **Tax Exemption:** ITA was amended to make cash donations of only Rs 2,000, received other than by way of cheque, bank draft, electronic clearing system or electoral bonds, eligible for tax exemption from income tax.
- 3) **Ceiling on Contribution Removed:** The amendment of the CA had the effect of making every company, loss-making or profit-making, eligible to make unlimited corporate funding to political parties. The earlier ceiling of 7.5% of profits was removed.

All the above amendments were held unconstitutional.

What are the other provisions in the SC judgment?

- 1) **No Fresh Issue of Electoral Bonds:** It stops the State Bank of India (SBI) from issuing any more EBs.
- 2) **Details of Purchase of EBs to be submitted to ECI:** SBI has been directed to submit the details of EBs purchased to the ECI. The details shall include the date of purchase, the name of the purchaser

and the denomination of the electoral bond.

SBI has also been directed to submit the details of the political parties, which received and deposited the contributions through EBs.

3) **Publishing of these Details:** ECI has been directed to publish the information received from the SBI on its website by March 13.

What are the principles used by the SC to base its judgment on?

1. **Ensure Transparency in Governance:** The SC laid stress on the virtues of “open governance” and the idea that “information about funding of political parties is essential for the effective exercise of the choice of voting”.

2. **Prevent Undue Influence over Policymaking:** The SC wanted to discourage/stop corporate funding for political favours, since political contributions enhance access to legislators and influence over policymaking.

3. **Violates Right to Information:** SC accepted that the purpose of curbing black money could be a legitimate objective of EBs. However, it viewed EBs as infringing on the right to information.

What are the challenges which still remain in the case of electoral funding?

- 1) Corporates may resort to making completely unaccounted political donations.
- 2) Only profitable corporates would be able to make political donations within the limit of a maximum of 7.5% of profits. According to the authors, though this route was always available, it was seldom used and is unlikely to be used in the future as well.

Subject: Social Justice

Topic: Issues relating to Education

CBSE's Open-Book Examination Experiment

News: The article discusses CBSE's open-book examination experiment.

Background:

The Central Board of Secondary Education (CBSE) is experimenting with the possibility of “open-book” examinations (OBE).

Why is this being done?

This can tackle the following:

- a. Emphasis on rote learning.
- b. Issues with MCQ-centric standardised tests.
- c. Prevalence of “success manuals” sold by coaching factories.
- d. Psychology of fear associated with board examinations.

What should be done to revolutionize the education system?

- 1) **Changes in Pedagogy:** This is possible only when children are encouraged to realise and trust their hidden potential, and teachers engage in a meaningful dialogue with young students.
- 2) **Different kinds of questions:** They should arouse and activate the critical faculty and creative imagination of young students. Those who design the question papers must work hard, learn and unlearn simultaneously.
- 3) **Encouraging Creativity:** Students are hardly encouraged to see beyond textbooks, study the literature outside the syllabus, relate the classroom to the larger world, and think differently and creatively. The spirit of dialogue and critical pedagogy in the classroom should encourage “higher order” or innovative thinking.

What will be the challenges?

Challenge for the teachers: They cannot ask the same questions year after year; they must constantly activate your mind and experiment with ideas.

Challenge for young students: As there is no ready-made answer in textbooks or other “success manuals”, they need to sharpen their analytical thinking, creative imagination and style of writing.

On India's Public Education System

News: The article discusses the importance of investing in education. It also highlights the improvements being seen in India's public education system, and the challenges which still remain.

Why is investing in education important?

1. **Leveraging Demographic Dividend:** Investing in public education systems is crucial for countries seeking to leverage their demographic dividend. For instance, **South Korea's** emphasis on education significantly improved literacy rates and provided the necessary skills for industrial and technological sectors, which contributed to its economic development.
2. **Economic Growth:** Empirical research shows that educational investment is positively correlated with economic growth. For instance, according to **World Bank** studies, each additional year of schooling is associated with up to a 10% increase in individual earnings, and countries prioritizing educational quality generally exhibit higher economic growth rates.

What are the improvements being seen in India's public education system?

The **Unified Digital Information on School Education (UDISE+) 2023** data shows that there were significant advancements seen in India's public education system. These include:

1. **Decrease in Pupil-Teacher ratio (PTR):** It has seen a remarkable decrease across all levels of education, signifying smaller class sizes and more individualized attention to students. It reflects an effort to improve the quality of education through increased teacher recruitment.
2. **Gender Parity in Teaching Staff:** The teaching staff has attained a gender balance, with female

teachers now comprising 52.3% of the workforce in 2022-23, up from 46.9% in 2014-15.

3. Rise in Learning Outcomes: Between 2013 and 2022, the number of students within the public education system passing with 60% and above has surged, with 'pass' students in Class 10 rising from 5.8 million to nearly 9.8 million and in Class 12 from 3.6 million to over 4.3 million.

4. Rise in Female Education: The pass rates of female students rose by 72% in Class 10 and 87% in Class 12, surpassing the improvement rates of male students.

What is the 'Pyramidal Structural' challenge in India's public education system?

The Right to Education (RTE) Act of 2009 mandated **distance norms for primary and upper-primary schools (1km and 3km respectively)**. This significantly increased accessibility to education. It expanded educational infrastructure, particularly at the primary and upper-primary levels.

However, the Act's focus on elementary education has led to:

a. **Scarcity of secondary and higher secondary schools:** There are 743,000 schools at the primary level, accounting for 50.7% of all schools. However, only 150,000 schools (10.3%) are present at the higher-secondary level.

b. **Disproportionate allocation of resources for elementary schooling:** As a result, according to UDISE+ data, there are 122.5 million enrolments in primary schools. However, it decreases to 38 million at the secondary level, and only 27.8 million at the higher-secondary level.

What should be done?

1. Increasing secondary and higher-secondary seats.
2. Enhancing educational access.
3. Ensuring a smooth educational progression with sufficient infrastructure and teachers at the state level.

According to the authors, it is the responsibility of state governments to implement these critical steps. Addressing this pyramidal shrinkage is crucial to tackle educational disparities and unlock India's human capital potential.

Primary schoolteacher qualification in India - A ruling that gives primary school teaching a new slate

News: The article discusses the Supreme Court of India's ruling that for primary school teaching, specific degrees like DEd, DEEd, or BEEd are necessary, not just a BEd degree. It highlights the need for better training programs and government support for primary school teacher education.

What is the current status of primary schoolteacher qualification in India?

According to the State of Teachers, Teaching and Teacher Education Report 2023, 90% of teachers have professional qualifications. However, only 46% teaching primary grades have the appropriate DEd/DEEd qualifications.

30% of primary teachers hold a B.Ed degree, and 10% have no professional qualifications. In private unaided schools, only 22% have DEd or equivalent; 43% hold B.Ed degrees.

What are the issues with primary schoolteacher qualification in India?

1. **Mismatch in Qualifications:** 30% of primary teachers have a B.Ed degree, which isn't considered appropriate for primary education as per the Supreme Court ruling.
2. **Private Sector Discrepancies:** In private unaided schools, 43% of primary school teachers hold B.Ed degrees, and 17% do not have any professional qualification.
3. **Training Quality Concerns:** Students from government-funded DIETs perform better, with 59% qualifying in TET with an average score of 86/150, compared to 31% from self-financed institutions with an average score of 77/150.
4. **Low Achievement in Key Areas:** Overall, only 14% of TET candidates scored above 60%, with particularly low mean scores in mathematics (46%).
5. **Insufficient Government Support:** Despite the need, there's a lack of focus on primary school teacher education and innovation, with emphasis mainly on higher education faculty development.

What initiatives have been taken for the improvement of primary schoolteacher qualification in India?

1. **Integrated Teacher Education Programme (ITEP):** Announced to bring primary school teacher preparation into university/higher education, focusing on specialized training.
2. **Strengthening DIETs:** Ministry of Education initiative to improve District Institutes of Education and Training for better teacher education quality.
3. **Pandit Madan Mohan Malaviya National Mission:** Continued commitment in the Union Budget 2023 to enhance teacher education, although mainly focused on higher education faculty development.
4. **Innovative Programmes:** Proposals to create pathways for B.Ed holders to receive certification for primary school teaching, such as professional development courses or specialized B.Ed programs.

What should be done?

1. **Quality Enhancement in Self-Financed Institutions:** Improve the training quality in self-financed sectors, ensuring they match the standards of government-funded institutions.
2. **Implement Innovative Training Models:** Consider models like the Integrated Teacher Education Programme (ITEP) for primary teacher education, integrating it more into the university/higher education space.
3. **Create Certification Pathways for B.Ed Holders:** Offer specialized training or certification programs for B.Ed graduates to qualify them for primary education teaching.
4. **Strengthen Government Support:** Increase government involvement and funding in primary teacher education, focusing on both innovation and quality enhancement.
5. **Ensure Rigorous Testing Standards:** Adopt stricter testing standards, like section-wise qualifying marks in TET, to ensure teachers' competence, especially in foundational subjects like mathematics.

Topic: Issues relating to Health

Diversity important in health policy making-The diversity blindspot in health policy

News: This article discusses the lack of diversity in India's health committees. It highlights the underrepresentation of women, non-medical professionals, and people from diverse regions, and suggests that this affects the quality of health policies and decisions.

What is the gender distribution in health sector roles?

Gender Distribution in Health Sector Roles in India:

1. Women make up nearly half of all health workers in India.
2. However, only 18% of them reach leadership positions in health panels, committees, and hospitals.
3. In the 23 National Health Committees analyzed, women representation is just 11%.
4. Remarkably, 36% of these committees do not have any women members at all.
5. Women constitute 29% of doctors and 80% of the nursing staff.
6. Nearly 100% of Accredited Social Health Activists (ASHAs) in India are women.
7. Women's roles are often in frontline, lower-paid positions.

Global Gender Distribution in Health Sector Roles:

1. Women account for 70% of the global health workforce.
2. They occupy only 25% of senior positions in healthcare worldwide.
3. Just 5% of women are in leadership roles in the global healthcare sector.

What are the issues with health committees in India?

1. **Underrepresentation of Women:** Only 11% of members in India's National Health Committees are women, and 36% of these committees have no female members.
2. **Lack of Diversity:** The committees predominantly consist of men, particularly doctors and bureaucrats, mainly from urban and privileged backgrounds. This limit diverse perspectives in policymaking.
3. **Centralization of Power:** Most committee members are from the Delhi-NCR region, indicating a geographical imbalance in representation.
4. **Dominance of Medical Professionals:** There's an over-concentration of doctors in these committees, which may lead to a narrow clinical view in health policy, overlooking preventive and community health aspects.
5. **Limited Inclusivity in Policy Making:** The lack of varied backgrounds among committee members affects the inclusivity and relevance of health policies for diverse populations.

Why is diversity important in health policy making?

1. **Reflects Varied Needs:** Diverse committees can better address the different health needs of various populations. For example, policies might fail to consider affordability and household dynamics without diverse perspectives.
2. **Enhanced Understanding of Women's Health Needs:** Including women in health policy making brings essential insights into maternal care, reproductive health, and gender-specific diseases. This diversity in perspectives ensures that the health policies developed are more comprehensive and sensitive to the needs of women,
3. **Regional Representation:** Over-concentration of individuals from metropolitan areas, particularly Delhi-NCR, overlooks regional health issues. Diverse regional representation is essential for policies that cater to the unique health challenges of different areas.
4. **Professional Diversity:** The dominance of doctors in committees can lead to a narrow clinical focus. Including non-medical professionals and NGOs can broaden the scope to include preventive care and social health aspects.

Way forward

To improve health policy making, India needs more inclusive health committees with reserved seats for women and marginalized groups. This approach can ensure diverse perspectives in decision-making, leading to more equitable and effective health policies that address the needs of all population segments.

Sanitation coverage in India - A critical view of the 'sanitation miracle' in rural India

News: The article discusses how India improved public sanitation from 2014 to 2019, moving towards being Open Defecation Free. However, challenges remain in ensuring toilet use and addressing social norms.

What is the current status of sanitation coverage in India?

Access to water and sanitation is **Goal 6 in the 17 Sustainable Development Goals** envisaged by the United Nations.

Sanitation coverage in India significantly **improved from 39% in 2014 to 100% in 2019**, as per the Government of India.

The Swachh Bharat Mission-Grameen (SBM-G), launched in 2014, aimed to make India Open Defecation Free (ODF) by October 2019.

- a. The government's current goal is to transition from ODF to ODF Plus by 2024-25, with about 85% of villages already achieving ODF Plus status.
- b. The National Annual Rural Sanitation Survey (NARSS) Round-3 (2019-20) reports that 95% of India's rural population had access to toilets. Of these, 79% owned their toilets, 14% shared facilities, and 1% used public toilets.
- c. Although 96% of these toilets were functional and had water access, **only 85% of the rural population used safe and hygienic toilets.**
- d. Toilet access varied by caste, with 97% for upper castes and 95% for Scheduled Castes.

- e. The upper castes showed a higher percentage of toilet non-use compared to backward castes.
- f. Between 2014 and 2019, approximately 10 crore toilets were constructed under the SBM-G.

What are the issues with sanitation coverage in India?

1. **Incomplete Usage Despite Access:** While sanitation coverage improved to 100% by 2019, only 85% of rural Indians use safe and hygienic toilets, indicating a gap in actual usage.
2. **Quality and Infrastructure Issues:** Problems like malfunctioning facilities, unhygienic conditions, and structural issues like full pits or collapsing superstructures hinder toilet usage.
3. **Water Scarcity Impact:** Lack of water access, especially in rural areas like Gujarat's Dahod district, leads to higher non-use of toilets.
4. **Behavioral and Social Norms:** Cultural norms and behaviors affect toilet usage, with some households using them for purposes other than defecation.
5. **Caste-Based Variances:** Toilet access and usage vary across castes, with upper castes surprisingly showing higher rates of non-use.
6. **Challenges in Larger Households:** Larger households often struggle with toilet usage due to overcrowding and limited facilities.

What initiatives have been taken for sanitation coverage in India?

1. **Central Rural Sanitation Programme (CRSP):** Launched in 1986, it was India's initial step towards improving rural sanitation with substantial subsidies.
2. **Total Sanitation Campaign:** Started in 1999, this marked a shift to a lower subsidy, demand-driven approach.
3. **Swachh Bharat Mission-Grameen (SBM-G):** Launched in 2014, this mission aimed to make India Open Defecation Free (ODF) by October 2019. The government aims to transform India from ODF to ODF Plus by 2024-25.
4. **Phase II of SBM-G:** Focuses on sustainability, promoting solid and liquid waste management, and covering households left out earlier.
5. **National Annual Rural Sanitation Survey (NARSS):** Conducted to assess rural sanitation coverage, showing 95% of rural India having toilet access.

What should be done?

1. Focus on changing cultural and social norms to increase actual toilet usage.
2. Ensure toilets are functional and hygienic, addressing issues like collapsing structures and full pits.
3. Focus on households that were not covered in the initial phases, particularly in rural areas.
4. Tailor strategies to be sensitive to the variations in toilet usage across different social and caste groups.
5. Align sanitation initiatives with other related programs like the Jal Jeevan Mission for better outcomes.

Topic: Issues relating to development and management of Social Sector

Status of social sector in India-The problem of moving attention away from services

News: This article discusses the Indian Finance Minister's budget speech, highlighting the government's achievements over the past 10 years and its plans for future spending. It critiques the speech for lacking major new announcements and questions the government's claims about poverty reduction and income growth.

What is the current status of social sector in India?

1. **Multidimensional Poverty:** The government claimed to have lifted 25 crore people out of multidimensional poverty in 10 years.
2. **Income Levels:** It's noted that average real income reportedly increased by 50%, but this average doesn't reflect changes in the poor's lives.
3. **Real Wages:** Real wages have been stagnant, with rural worker earnings barely increasing from \$3 in 2004-05 to \$4.80 in 2014-15.
4. **Job Scenario:** The increasing share of agriculture in employment and high demand for jobs under MGNREGS suggest limited non-agricultural job opportunities.
5. **Women's Labor Force Participation:** The increase in women's participation is viewed more as a sign of economic distress rather than improvement.

What are the provisions for the social sector in the Budget for 2025?

1. **Overall Social Sector Funding:** The 2025 Budget maintains most social sector scheme allocations at levels similar to the previous year.
2. **Education Sector:** Allocations for school and higher education departments show nominal increases compared to last year's BE, around 6-8%.
3. **Health and Family Welfare:** The health and family welfare departments also received similar nominal increases.
4. **Anganwadi Centres:** The budget for Saksham Anganwadi at ₹21,200 crore is slightly lower than the RE of ₹21,523 crore for 2023-24.
5. **Mid-Day Meal Scheme:** The PM-POSHAN budget for school mid-day meals is ₹11,600 crore, compared to the RE of ₹12,800 crore for 2023-24.
6. **Social Assistance Programs:** The allocation for the National Social Assistance Programme, which includes pensions, was only ₹9,652 crore, lower than the ₹10,618 crore in 2014-15.

Way forward

To ensure balanced development, the government needs to prioritize basic education, health, and nutrition, which have been overshadowed by high-profile schemes (such as the Awas Yojana or sanitation). Addressing these fundamental areas, along with creating diverse employment opportunities, is crucial for reducing inequalities and fostering a more inclusive and sustainable economic growth.

Topic: Mechanisms, laws, institutions and bodies constituted for the protection and betterment of vulnerable sections

Supreme Court's decision on women's employment- Ending discrimination

News: The article discusses a Supreme Court of India ruling that it's unconstitutional to fire women for getting married.

What challenges do women face in the civilian workforce?

1. **Personal Questions in Interviews:** Women often face uncomfortable personal questions about their marriage and motherhood plans during job interviews.
2. **Low Workforce Participation:** Data shows that only 19.9% of women in India participate in the workforce, highlighting a significant gender gap in employment.
3. **Education Barriers:** Many girls, especially among the poor, drop out of school due to various reasons, ranging from economic challenges to lack of proper facilities like toilets.
4. **Restrictive Social Norms:** Women are often bound by societal and cultural expectations, which limit their opportunities and advancement in the workforce.
5. **Unequal Domestic Responsibilities:** The UN's **Gender Snapshot 2023** indicates that women are expected to undertake a disproportionate amount of housework and caregiving duties compared to men.

What was the Supreme Court's decision on women's employment?

1. **Ruling on Marriage and Employment:** The Supreme Court of India ruled that terminating women's employment for getting married is unconstitutional.
2. **Case Example - Selina John:** This decision came from the case of Selina John, a former lieutenant in the Military Nursing Service, who was discharged in 1988 for getting married.
3. **Compensation Ordered:** The Court directed the Indian Government to pay Ms. John ₹60 lakh in compensation.

How does this affect gender equality?

1. **Promotes Equal Treatment:** The Supreme Court's decision against penalizing women for marriage supports equal treatment in employment.
2. **Encourages Women's Participation:** It may encourage more women to join and stay in the workforce, knowing their marital status won't affect their employment.
3. **Supports Broader Gender Parity Efforts:** This decision aligns with efforts to achieve gender parity in areas like the military, where women recently gained the right to permanent commission.
4. **Challenges Patriarchal Norms:** It challenges patriarchal norms and societal expectations that restrict women's professional opportunities.

Way forward

To move forward, societal and cultural norms that restrict women's opportunities must change. Organizations should make workplaces supportive, not limiting women based on marriage or domestic roles. Increasing women's participation in the workforce, currently at 19.9% in India, is crucial for achieving gender parity.

SWATI Portal to address gender imbalance in Indian Science

New: The article discusses efforts to reduce gender gaps in Indian science. It mentions the launch of SWATI on February 11, a portal aiming to list every woman in Indian science. It also highlights past initiatives and policies to support women in STEM fields.

What are India's past efforts to address gender imbalance in Indian science?

2004 INSA Report: The Indian National Science Academy's report was a pioneering effort, being the first government-supported document to discuss the gender gap in STEM fields. It highlighted discrimination based on gender and caste in the workplace.

2008 Initiatives:

Lilavati's Daughters: The Indian Academy of Sciences (IASc) released this compendium to showcase the achievements of women scientists.

National Conference: Organized by a Department of Science and Technology task force, it included over a thousand women scientists. Significant promises were made by then Science Minister Kapil Sibal, including flexible working hours, in-house creches, and research grants for women scientists. However, the committee for implementing these measures was not successful.

2010 IASc Report: This report, by a team of sociologists and scientists, focused on why women scientists leave academia. It revealed that while men mostly blamed family and sociocultural factors, women pointed to a lack of opportunities and organizational barriers.

Recent Progressive Policies: The **Gender Advancement for Transforming Institutions (GATI)** charter and the draft **Science, Technology and Innovation Policy (STIP) 2020** have adopted more inclusive and progressive language. These policies consider factors like caste, transgender identity, and gender-neutral parental leave, showing an evolution in approach.

SWATI Portal Launch in 2024: SWATI, launched on February 11, 2024, is a portal aimed at listing all women in science in India. It was first announced in 2021 but only recently became active.

What is the significance of SWATI Portal?

1. **Comprehensive Database:** SWATI aims to list every woman in Indian science, creating a unique and extensive database.
2. **Inclusivity:** It includes all non-male genders, recognizing diversity in the scientific community.
3. **Breaking Barriers:** By not limiting to those with PhDs, SWATI acknowledges various capacities in which women contribute to science.
4. **Increased Visibility:** The portal can enhance visibility and representation of women in STEM fields.

5. **Step Towards Equality:** SWATI represents a significant effort towards addressing the gender gap in Indian science, promoting more equitable participation.

Way forward

For a better future, India needs to fully implement existing promises like flexible work hours and support for women in science. It's crucial to involve women in creating policies and recognize broader issues like caste and transgender identity, as in recent policies. The SWATI portal should be used effectively to support and connect all women in science.

Subject: International Relations

Topic: India and its neighborhood- relations

China's 'Xiaokang' border defence villages

News: The article discusses how China is building and now occupying "Xiaokang" villages along the India-China border for both civilian and potential military use, prompting concerns.

What are Xiaokang border defence villages?

1. **Construction and Location:** China has built 628 Xiaokang villages along the India-China border, including sensitive areas like Ladakh and Arunachal Pradesh.
2. **Dual Purpose:** These villages are designed for dual-use, serving both civilian and potential military functions.
3. **Infrastructure:** The villages feature substantial buildings, mostly double-storey and spacious, indicating a significant investment.
4. **Strategic Intent:** The placement of these villages along the disputed Line of Actual Control (LAC) is seen as a method for China to assert territorial claims.
5. **Legal Framework:** China introduced a law in 2021, effective from January 1, 2022, focusing on the protection and exploitation of its land border areas, which encompasses these border defence villages.

How is India responding?

1. **Vibrant Villages Programme:** India launched this initiative in 2022, focusing on developing border villages to counter China's village program.
2. **Development Goals:** The program aims to modernize 663 Indian border villages, making them not only habitable but also attractive as tourist destinations.
3. **Pilot Project:** In the first phase, 17 villages along the China border, including in strategic locations like Ladakh, Himachal Pradesh, Uttarakhand, Sikkim, and Arunachal Pradesh, are being developed.
4. **Specific Focus Areas:** In Arunachal Pradesh, villages such as Zemithang, Taksing, Chayang Tajo, Tuting, and Kibithu are identified for development.

5. **Infrastructure Enhancement:** Alongside the village development, India is improving border infrastructure with new roads, bridges, and helipads to strengthen connectivity and response capabilities.

Way forward

To ensure regional stability, India and China need to maintain open communication and diplomatic efforts. Balancing infrastructure developments, like India's Vibrant Villages Programme and China's Xiaokang villages, with peaceful negotiations, is crucial to resolving border disputes and reducing tensions along the Line of Actual Control.

On the Importance of Indian Ocean for India

News: The article discusses the historical importance of the Indian Ocean for India. It also highlights why focusing on the Indian Ocean is important for India in current times.

What was the reason for the large historical contribution of India to global economy?

India had been the largest economy in the world in the first millennium with a share of almost **33% of the world's GDP**. According to the author, this was not due to its population size (as claimed by some experts), but because of the control of Indian rulers over the oceans at that time. They had developed powerful **merchant and military navies** and established **trade with the Arabs** in the West and into **South China Sea territories**, crossing the Malayan Peninsula in the East.

What are the historical references with regard to the importance of the Ocean?

- 1) **Sea-Trading Communities and Kingdoms:** Sea traders of south India like Manigramam Chettis and Nanadesis, and Kings like the Andhras, Pallavas and Cholas were prominent players.
- 2) **Maritime Administration:** Kautilya's Arthashastra talks about the functions of officers like port commissioners and harbour masters.
- 3) **Separate Shipping Department:** The Board of Shipping was one of the six important departments of the Mauryan empire.

What led to a decline in India's dominance of the seas?

According to the author, a lack of attention to the seas led to an eventual decline of India's dominance of the seas.

- 1) **British Era:** The British didn't develop a strong blue-water presence during their rule over India. The Royal Indian Navy was small for a country of India's size.
- 2) **Post-Independence Era:** The lack of attention to the seas continued, with the governments giving **greater priority to land-based warfare**. India declined in areas like shipbuilding and naval vessels. For instance, Indian Navy has less than 200 combat vessels (US has 400 and China has 500).

Why is focusing on the Indian Ocean important for India?

The Indian Ocean is the world's 3rd-largest ocean. Its maritime trade routes manage almost 70% of the world's container traffic.

Importance for India:

- a. **Trade Route:** 80% of India's external trade and 90% of the energy trade happens through it.
- b. **Prominence of the Indo-Pacific in Geopolitics:** The global power axis has shifted away from the Pacific-Atlantic to the Indo-Pacific in India's neighbourhood now.
- c. **Civilisational Importance:** It carried India's cultural and civilisational imprint across its shores and created a vast sphere of India's civilisational influence.

What recent steps have been taken by the government in this regard?

7th Indian Ocean Conference: It seeks to address non-traditional challenges common to nations of the region, such as climate change, ocean levels, natural disasters and supply chain disruptions.

India Sri Lanka Fishermen Issue - Unending woes

News: The article discusses the frequent arrests of Tamil Nadu and Puducherry fishermen by the Sri Lankan Navy. These fishermen are accused of illegally entering Sri Lankan waters, affecting local livelihoods, and using harmful fishing methods.

What are the reasons for the arrest of Indian fishermen by Sri Lanka?

1. **Crossing Borders:** Indian fishermen often enter Sri Lankan waters, leading to their arrest. For example, 69 fishermen have been arrested this year for such violations.
2. **Destructive Fishing Practices:** They are accused of using bottom trawling, which is banned in Sri Lanka since July 2017. This method is harmful to marine life and the livelihood of Sri Lankan fishermen.
3. **Geographical Constraints:** Under the Tamil Nadu Marine Fishing Regulation Act 1983, Indian fishermen can operate only beyond three nautical miles from their coast. The proximity of the International Maritime Boundary Line, just nine nautical miles away, leads to frequent unintentional crossings.
4. **What are the implications of the arrest of Indian fishermen by Sri Lanka?**
5. **Increased Tensions:** The arrests contribute to ongoing tensions between India and Sri Lanka, affecting diplomatic relations.
6. **Humanitarian Concerns:** The fishermen face long detentions, with some remaining in custody for months. This raises humanitarian issues.
7. **Financial Losses:** The confiscation of expensive fishing equipment, like nets and boats, leads to significant financial hardships. In 2024, 10 boats were seized.
8. **Impact on Diplomatic Relations:** Despite high-level diplomatic interventions, including agreements for periodic meetings and working groups, the issue remains unresolved, indicating strained relations between India and Sri Lanka.

What should be done in this situation?

1. **Promote Alternative Fishing Methods:** As India has promised to end bottom trawling and incentivize deep-sea fishing under the Blue Revolution Scheme, more efforts are needed to ensure this transition.

2. **Respect Maritime Boundaries:** Educate and equip fishermen to avoid crossing into Sri Lankan waters, considering the close proximity of the International Maritime Boundary Line.
3. **Regularize Diplomatic Talks:** Implement the agreed-upon bi-annual meetings between the Ministers of Fisheries and ensure the Joint Working Group on Fisheries meets every three months as planned.
4. **Address Humanitarian Concerns:** As emphasized by India's Prime Minister, treat the issue as a humanitarian concern, focusing on the well-being of the fishermen and their families.

Topic: Important International institutions, agencies and fora- their structure, mandate

Issue with WTO's Dispute Settlement Mechanism (DSM)

News: Issue with WTO's Dispute Settlement Mechanism (DSM), The article discusses the issues with WTO's dispute settlement mechanism (DSM) and the possible options available in front of developing countries.

A detailed article on the **Dispute Settlement Mechanism of the WTO** can be [read here](#). A detailed article on **WTO reforms and India** can be [read here](#).

What is WTO's Dispute Settlement Mechanism (DSM)?

WTO's DSM comprises a binding **two-tiered process** with a **panel** and an **appellate body (AB)**. The AB hears appeals from the decisions rendered by WTO panels and is a permanent judicial body of 7 independent members with compulsory jurisdiction over all WTO members.

What are The Issues with WTO's DSM?

Since the end of 2019, this mechanism stands non-functional because the US, which lost several critical disputes before it, has blocked the appointment of new members. This has made the WTO toothless. Countries are avoiding complying with the WTO panel rulings. At the 12th WTO ministerial meeting, countries resolved to create a fully functioning DSM by 2024. India and several developing countries have rightly demanded the body's restoration.

What are The Options Available with The Developing Countries?

Since the US is unlikely to change its stance, developing countries have three options to maintain a two-tiered DSM at the WTO:

1. **Join the European Union-led multi-party Interim Appeal Arbitration Arrangement (MPIA):** It formalises the mechanism for arbitration already available under the WTO to provide the appellate review for panel reports.
2. **An AB with Diluted Powers:** US may consider an AB with limited powers (such as stating that AB rulings will not have a persuasive value).

However, a diluted AB will be antithetical to the role that WTO law expects the DSM to play.

3. **Voluntary Compliance to the AB:** In this scenario, countries will have the option to opt out of AB's compulsory jurisdiction. A country opting out cannot participate in an appellate process either as a complainant or as a respondent.

What Should be The Way Forward for India?

India and other developing countries should continue striving for the restoration of the AB in the form it existed till 2019. However, if this doesn't happen, India should prefer an AB for only willing countries, as per the author.

India could help shape a whole new global consensus

News: The article discusses the events shaping global geopolitics and the role India can play in evolving a new global consensus.

Read about **India at Davos 2024** [here](#).

World leaders had expected an economic order shaped by hyper-globalization - a world where conflicts would become marginal thanks to increased economic interconnectedness, global identities, and where global institutions would effectively mediate inter-state challenges. But today's world is being shaped differently by the forces of geopolitics in various ways.

What are the events shaping global geopolitics today?

- a. **Ukraine war**
- b. **Israel-Hamas conflict**
- c. **Threats to sea-lanes** that are critical for global trade.
- d. **China challenge**
- e. **Strategic ties between the West and China** are destabilized.
- f. **Pandemic and its aftermath:** It has alerted nations to the need for self-reliance in critical sectors and minimal exposure to supply chains overseas.
- g. **Disenchantment with globalisation:** Energy prices have gone up, with hopes of a global economic recovery again doubtful.
- h. **Rising Prominence of the Global South:** It is the Global South that is likely to drive global growth in the coming years, with India being one of the top performers.

It is, therefore, imperative for the developing world to have this reality better reflected in the agenda of platforms such as the World Economic Forum.

How is India better placed to provide leadership?

- 1) **India's Rising Stature:** India is in a geopolitical and geo-economic sweet spot. The developed world looking inwards, and China's aggressiveness has led to a leadership vacuum that needs to be filled.
- 2) **Significant Presence at Davos Summit:** India's significant presence at Davos this year underlined India's willingness to project its growing economic heft, innovation and tech.
- 3) **Trust-based Relations:** India's ability to craft trust-based partnerships with multiple players at the

same time is a sign of its self-confidence and the trust of others to bet on India at a time of geopolitical turmoil.

From climate and energy transitions to the regulation of artificial intelligence, the role of the Global South and nations such as India should be critical. India should evolve a new consensus that could challenge the old Davos Consensus.

Raisina Dialogue: Significance and issues

News- Recently, the 9th edition of the Raisina Dialogue 2024 was inaugurated by Prime Minister Narendra Modi in New Delhi.

What is Raisina Dialogue?

The Raisina Dialogue is an annual conference on geopolitics and geoeconomics, which aims to address the most challenging issues faced by the world. The conference takes place in New Delhi and is attended by people from political, business, media, and civil society backgrounds. Delhi-based think tank Observer Research Foundation, in partnership with the Ministry of External Affairs, hosts the conference.

What is the significance of Raisina Dialogue for India?

- 1) **A Platform for dialogue**-It provides opportunities for India to have dialogue and discussion on key regional and global issues.
- 2) **“Vishwamitra” or friend of the world** -It reflect Indias commitment and aspiration to be a leading voice and contributor in the international arena by mutual cooperation.
- 3) **Uphold rule-based order**- It demonstrates India’s commitment to a rules-based and inclusive world order.
- 4) **Advancing national interest**-The platform provides opportunities to showcase India’s achievements and potential in various fields and advancing its strategic and economic interest.

What are the issues with the recently held Raisina dialogue?

- 1) **Agenda dominated by European Interests**-There was a great focus on Russia-Ukraine war during Raisina dialogue. Other important issues like Israel war on Gaza and agenda of Global South, were not adequately discussed.
- 2) **Lack of balance**-The European dignitaries have raised issue of Chinese and Russian aggressive posturing. However, neither Russia nor China was invited.
- 3) **Lack of diversity**- There was minimal presence from Southeast Asia, Latin America, and even South Asia (excepting Nepal and Bhutan).
- 4) **Under representation of civil societies**- There was lack of adequate representation of non-governmental civil society organizations in the discourse.

Inefficiency of United Nations

News-The article highlights the challenges to post-World War order and limitation of the United Nation in addressing this challenge.

What are the challenges to post world war order?

1) **Major global institutions dominated by the west-** The old-world powers like U.S.A and European colonial countries controls power structures of the new institutions.

For ex- a) The World Bank is always headed by an American citizen. b) Western Europe gets to nominate the head of the IMF.

2) **Veto power of permanent members-** Developing world has tried to group under G-77 and NAM to advance their legitimate demands. However, they could not overcome the veto at the Security Council.

3) **Rise of ad-hoc groups-** There are many multilaterals and plurilateral groupings. For ex-OECD, QUAD etc.

However, they have a narrow focus and do not address issues of global concern. It attaches more importance to regional interest than global interest.

4) **Covid Pandemic-**It has aggravated the problems of de-globalization by restriction on movement of people.

5) **Regional wars-** Russia's invasion of Ukraine, war in Gaza has exposed the failure of U.N. to protect the violation of human rights.

A detailed article on the **Shortcomings of UN** can be [read here](#).

Can any regional organization replace the UN system?

1) The organizations and groupings outside the UN are all ad hoc and serve limited interests rather than universal values.

2) Organization like North Atlantic Treaty Organization are limited alliances created to ensure regional security.

3) Most of the organizations do not have global treaties and binding legal obligations thus they are not effective.

The United nation may have its own challenges but there is no regional institution which can replace it. Hence, there is a need for changes in the functioning of the United Nations so that it can ensure global peace and prosperity.

Topic: Bilateral, regional and global groupings and agreements involving India and/or affecting India's interests

On India-UK Defence Ties – In a tough world, the beacon of U.K.-India strategic ties

News: The article discusses the converging interests of India and UK in the maritime domain. It also highlights how and why India-UK defence ties are becoming stronger.

A detailed article on **India-UK Relations** can be [read here](#).

What are the converging interests of India and UK in the maritime domain according to the author?

1. Both are outward facing, mercantile and modern societies.
2. Although separated by thousands of miles, both are inherently connected by the ocean.
3. Trade in food and goods is the reason for mutual prosperity, supporting the lives and livelihoods of many.

Considering this, both nations need to secure and free the seas from aggression and exploitation. It is important because of goods and resources that flow across the seas on which our economies rely. Even the data supporting online banking and capital flows also move via underwater cables.

Why are India-UK defence ties becoming stronger?

- 1) **Converging Interests:** The U.K. and India have a common interest in ensuring that violence and disregard for international law are not allowed to become normalised. For example: Houthi attacks in the Red Sea and the Ukraine conflict.
- 2) **Rise in Importance of Indo-Pacific:** The centre of gravity of the global economy by 2050 will be in the Indo-Asia-Pacific.

How are India-UK defence ties becoming stronger?

1. **Increasing Interaction between British and Indian forces:** There have been record numbers of U.K. ship visits to India. UK's Carrier Strike Group will be deployed again to the region in 2025 and will lead to increasing operational capabilities.
2. **Defence industrial partnership:** From electric warship propulsion to complex weaponry to jet engines, cooperation in sharing knowledge and expertise is increasing.
3. **Military education ties:** Officers from all three services of the Indian Armed Forces will be joining British service academies as instructors, sharing their experiences with future military leaders.

Factors are responsible for strengthening the relationship between Greece and India

News: The article discusses the strengthening relationship between Greece and India. Greek Prime Minister Mitsotakis is visiting India to deepen ties in various areas. Both countries see each other as

important strategic partners, with cooperation in business, military, and culture. This partnership is becoming increasingly important globally.

What factors are responsible for strengthening the relationship between Greece and India?

1. **Strategic Geographic Positions:** Both India and Greece are situated in key geopolitical locations, making each country an important strategic partner for the other in their respective regions.
2. **Military Cooperation:** Joint military exercises between the Indian Navy and Air Force and the Greek armed forces demonstrate growing strategic and defense collaboration.
3. **Economic and Infrastructure Development:** Economic reforms in Greece, combined with the potential India-Middle East-Europe Economic Corridor (IMEC), open new avenues for business collaborations. For information on IMEC [read here](#).
4. **Advocacy for Broader Relations:** Greece's support for the EU-India Bilateral Trade and Investment Agreement and its role as a reliable partner in the EU and NATO, strengthen its relationship with India.
5. **Interconnected Regional Stability:** The security of the East Mediterranean and the Indian Ocean regions are interlinked, emphasizing the importance of the Greece-India partnership in global stability.
6. **Cultural and Educational Exchanges:** Efforts to enhance people-to-people ties through student exchange programs, cultural events, and media cooperation play a vital role in deepening mutual understanding and respect.

What business opportunities are emerging?

1. **Infrastructure Projects:** An Indian construction company is collaborating with a Greek firm to build a new airport on the island of Crete, showcasing cross-border infrastructure cooperation.
2. **Banking and Finance:** A major systemic bank in Greece has partnered with a prominent Indian financial institution to sell mutual fund products globally, indicating a growing financial relationship.
3. **Investment by Business Leaders:** Notable investments include those by an Indian business family in the Greek food industry, demonstrating the potential for cross-industry investment.
4. **Shipping Industry Expansion:** An Indian shipping company has opened a brokerage firm in Athens, aiming to become a key player in the trans-Atlantic shipping market, highlighting opportunities in maritime trade.
5. **Support from Influential Investors:** Indian-Canadian billionaire Prem Watsa, a major foreign investor in Greece, endorses the potential of Greek-Indian business cooperation, emphasizing the investment appeal of both countries.

Way forward

Moving forward, Greece and India should focus on expanding their strategic partnership, emphasizing business collaborations like infrastructure projects and financial sector ties. It's crucial to boost people-to-people connections through more student exchanges, cultural events, and media

collaboration. Think tanks should collaborate for deeper understanding. This approach aligns with the urgency shown by both countries' leaders, marking 2024 as a pivotal year for their strategic relationship.

Challenges of India and Europe FTA - Brave new world

News: The article discusses the challenges in the free trade agreement between India and EFTA, focusing on intellectual property rights and data exclusivity in the pharmaceutical industry.

What is the main issue in the India- European Free Trade Agreement (EFTA)?

1. **Intellectual Property Rights:** In the India-EFTA Free Trade Agreement, a major issue is the management of intellectual property rights in the pharmaceutical sector. This has been a persistent challenge since the discussions began in 2008, with both sides striving to find a middle ground.
2. **Patenting:** The agreement grapples with the concept of patenting, where drug originators are granted exclusive rights for a certain period. This practice is counterbalanced by the ability of governments to enforce 'compulsory licensing', which allows them to override these monopolies in the interest of public health.
3. **Data Exclusivity:** A critical point of debate is data exclusivity, which protects the clinical trial data of drugs for a minimum of six years. This provision, if included, could greatly affect India's pharmaceutical industry, renowned for its export of affordable drugs. India has shown resistance to incorporating data exclusivity into the agreement.
4. **High Cost of Drug Discovery:** The negotiations are underscored by the high cost of drug discovery, a factor that drives the divide between original drug inventors and generic drug manufacturers. The expense of developing new drugs contrasts sharply with the lower costs of producing generic versions, highlighting a fundamental tension in the global pharmaceutical industry.

For information on India- European Free Trade Agreement (EFTA) read [Article1](#) and [Article2](#)

What is India's position in the negotiations?

1. India's position in the negotiations focuses on rejecting the concept of data exclusivity. This stance is rooted in protecting its significant pharmaceutical industry, especially its role as a major exporter of affordable drugs.
2. The country recognizes the need for balance between protecting drug patents and ensuring access to affordable medication.
3. India's experience with COVID-19 vaccine development highlights its capability in drug innovation, reinforcing its push for a more flexible intellectual property regime in the Free Trade Agreement.

Way forward

To secure its pharmaceutical future, India must invest more in fundamental research and ethical drug trials. This will enable the development of new drugs and therapeutics domestically. The successful creation of COVID-19 vaccines in India serves as a model for this approach.

Defence exports: A strategic imperative

News: The article discusses India's defence exports industry – its growth, reasons behind growth and positive future prospects.

Background:

What are the benefits of defence exports?

- 1) **Economic Gains due to Expanding Market:** Experts predict a rapid expansion of the global defence and aerospace industry, from \$750 billion in 2022, to **\$1.38 trillion by 2030**.
- 2) **Strategic advantages:**
 - a. **Dependencies:** Defence equipment from a specific nation establishes technological dependencies, influencing maintenance, repair, spare parts, etc.
 - b. **Military Interoperability:** It also enhances military interoperability, expanding options for joint operations.

These significantly impact the diplomatic and strategic geopolitical stance of partner nations.

What is the status of India's defence exports?

India's defence exports surged to a record **Rs. 16,000 crore in 2022-23**, a huge 800% growth in 5 years and reaching 85 countries across continents. This propelled India into the top 25 defence exporters globally.

Nearly **80% of this growth is attributable to private industry**.

India's expanding defence exports encompass missiles, rockets, torpedoes, artillery-guns, and drones, among others.

What has led to a surge in India's defence exports?

- a. Enabling participation of **private sector and startups** in defence industry ecosystem.
- b. Streamlining export permissions via a **web-enabled system**, which has reduced delays.
- c. **Online system to share enquires and leads** with defence industry.
- d. Instituting open general export licence.
- e. Including defence exports as a key area for **evaluating performance of defence attaches** posted in Indian embassies abroad.
- f. Availability of **defence lines of credit (LOC)**.
- g. Repositioning **DefExpo and Aero India** as world-class exhibitions showcasing India's defence innovation ecosystem.

What are the reasons behind positive future growth prospects?

- 1) **Integration of MSMEs:** Hundreds of Indian MSMEs will be integrated into global defence original equipment manufacturer (OEM) supply chains.
- 2) **China's declining arms exports:** This is due to poor quality and unreliable performance of Chinese equipment. For instance, Nigeria returning Chengdu F-7 fighters.
- 3) **Other Exporters Pre-Occupied:** Russia-Ukraine conflict-related disruptions, Israel's preoccupation with Hamas, and USA being tied up on multiple fronts has led to India emerging as a reliable partner for countries looking to diversify their sourcing.
- 4) **India's Expertise:** For instance, India is skilled at servicing Russian platforms, thus making it attractive to countries possessing Russian inventory.
- 5) **India's Strengths in the IT Space:** The rising importance of software and AI in defence platforms aligns with India's strengths.
- 6) **Defence Startups:** Government's **Innovation for Defence Excellence (IDEX)** programme has created hundreds of startups, which are poised for global licensing of their technologies.
- 7) **India's Positive Perception:** Transformation of the global perception of India as a rapidly reforming and growing innovation economy lends credibility to its defence industry.

What more needs to be done?

1. **G2G Sales:** Rules should be developed for **government-to-government sales** to make it easier for foreign governments to procure from Indian firms.
2. **Defence LOCs:** Allowing empanelled defence firms to include defence LOC as part of their proposals could be considered. Interest rates for defence LOC need to be reduced.
3. **Licensing of Indian Technologies:** Establishing a licensing template safeguarding national and startup interests is essential.

India "non-West" but not "anti-West" alignment -Express View on India's foreign policy

News: The article discusses how India is redefining its relationship with Western countries. India is not against the West, but has a distinct, non-Western identity. The US supports this approach, indicating strong India-US relations. India's domestic politics are shifting away from anti-Western sentiments.

What is India's new approach to international relations?

1. **Non-Western Identity:** India, led by External Affairs Minister Subrahmanyam Jaishankar, is positioning itself as non-Western, not anti-Western. This contrasts with other BRICS nations like Russia and China, which often appear more opposed to Western perspectives.
2. **Flexible Alliances:** India advocates for flexible international relationships, avoiding alignment against the West despite being a part of BRICS.
3. **Stronger Ties with the West:** India is strengthening its relationships with Western nations, particularly the US. Secretary of State Antony Blinken recognizes and supports this growing bond.

What is the US's perspective on India's position?

1. **Support for Flexibility:** The US, through Secretary of State Antony Blinken, endorses India's flexible approach to international relations, valuing diverse collaborations over rigid blocs.
2. **Recognition of Strong Bilateral Ties:** US acknowledges the strength of the US-India relationship, stating it is the strongest it has ever been, despite India's leading role in BRICS.
3. **No Conflict with BRICS Membership:** The US does not see India's membership in BRICS as a hindrance to their bilateral relationship.
4. **Encouragement for Variable Geometry:** US emphasizes the importance of "variable geometry" in current global contexts, supporting India's stance of maintaining multiple partnerships.

How is India's domestic politics influencing its foreign policy?

1. **Shift in Political Perspective:** The present government in India has transcended the traditional anti-Western paradigm. This marks a significant shift from previous governments' approach.
2. **Strategic Engagement with the US:** The present government's administration is actively engaging with the United States, building a strategic partnership that is described as deeper and broader than ever before.
3. **Decline of Traditional Resistance:** With the weakening of the Congress party and the decline of the left in India, resistance to engaging with Western countries, particularly the US and Europe, has diminished.
4. **Balancing Domestic Sentiments:** The government's characterization of India as "non-West" but not "anti-West" aligns with the rising conservative nationalist sentiments. This stance facilitates India's foreign policy in balancing domestic and international interests.
5. **Expanding Foreign Policy Horizons:** This approach allows the government to maintain support from various domestic political factions while expanding India's foreign policy horizons, especially in its relations with Western nations.

Qatar Releases Indian Navy personnel who faced death row

News: The article discusses the returning of the Indian Navy personnel earlier sentenced to death in Qatar.

Background:

Recently, the eight Indian Navy veterans who had been in Qatari custody since August 30, 2022 were released.

Earlier, the men were given the death penalty by a lower court in Qatar on October 26, 2023. Subsequently, a court of appeals in Doha struck down the death penalty on December 28. For more on this issue, [read here](#).

What is the significance of this event?

To bring citizens back home while ensuring that the growing economic and strategic ties between India and Qatar are not derailed in the process, is a good achievement of India's foreign policy. The episode shows how deep and broad bilateral ties have become.

What does this episode show in terms of India's foreign policy?

1. **Improving Relations with Gulf Countries:** India has moved on from its earlier stance of viewing the Middle East only through the prism of Pakistan or Israel-Palestine. This has resulted in strengthening of India's bilateral relations in the Gulf.
2. **Energy Cooperation:** Qatar is a major supplier of energy to India. The two countries have signed a **\$78 billion LNG deal** that extended an existing agreement on supply of liquified natural gas till 2048.
3. **Indian Diaspora and Remittances:** At least 8 lakh Indian workers are employed in the Gulf country which continues to be a major source of foreign remittances to the Indian economy.

What are the challenges?

- 1) **Points of Contention with Qatar:** These include the anti-India propaganda from Qatar-based media outlets and support for religious radicals in India.
- 2) **Prisoners in Gulf Countries:** Both the United Arab Emirates and Qatar hold around 3,000 Indian prisoners in their prisons and the prisons in the Gulf region hold more than half of the total Indian prisoners in foreign jails.

On Strengthening of India's Ties with the Gulf

News: The article discusses the achievements of India's diplomacy in the Gulf. It also mentions the factors behind the transformation of India-Gulf relations.

Background:

The Prime Minister is on a visit to the United Arab Emirates and Qatar.

What have been the achievements of India's diplomacy in the Gulf?

1. **Inauguration of the BAPS temple in Abu Dhabi:** A large Hindu temple would be built in the deeply Islamic and conservative Arabian peninsula with full state support.
2. **Release of 8 Indian ex-naval personnel by Qatar.**

What are the factors behind the transformation of India-Gulf relations?

- 1) **Diplomatic Effort:** For a long time, the Middle East did not figure in the political priorities of Indian diplomacy. However, since 2014, PM has travelled 15 times to the Middle East. Developing a personal connection with the emirs was also undertaken.
- 2) **Political Efforts:** Earlier India showed little interest in Arab political and economic life. That has changed through the setting up of the I2U2 group in 2022 and the India-Middle East-Europe Economic Corridor.
- 3) **Dropping the Religious Lens in Diplomacy:** Earlier, there was an overestimation of the religious

factor binding the Gulf and Pakistan, and an underestimation of the depth of goodwill in Arabia for India and the desire for greater cooperation. This approach has been discarded.

4) **Strategic Economic Cooperation:** India's focus in the past was on oil purchases, labour exports, and hard currency remittances. The potential of the Gulf to accelerate India's economic growth has now started receiving attention. This has opened unlimited possibilities for long-term economic partnerships with India.

5) **Defence Collaboration:** The Gulf countries are trying to diversify their defence partnerships amid the shifting regional geopolitics and are looking to India to act as a regional security provider. The scale and scope of India's military exchanges with the Gulf have grown.

A privileged strategic partnership-India and U.A.E.

News-The article highlights the robust bilateral relationship between India and U.A.E.

Context- Prime Minister Narendra Modi will pay **visit** to the United Arab Emirates (UAE) from February 13-14, 2024, to **inaugurate** a temple in Abu Dhabi.

What is the status of India-U.A. E relations?

The upcoming visit will be the Prime minister's **seventh visit** to the UAE since 2015 and the third in the last eight months. Further, UAE President was felicitated in a road show when he was in Gandhinagar in January this year as the chief guest of the **10th Vibrant Gujarat Summit**. In this short duration. India's relationship with UAE has evolved into becoming one of the most **prominent bilateral relationships** for New Delhi.

What are the Areas of cooperation between India-U.A.E. relationship?

- 1) **Strategic cooperation-**
 - a) India is a part of a number of important groupings such as **the I2U2 or the West Asian Quad comprising India, Israel, the United States and the UAE.**
 - b) The UAE is also part of the **India-Middle East-Europe Economic Corridor (IMEEC)** infrastructure project that was signed during the G-20 summit in Delhi. This is aimed to counter **China's Belt and road** initiative in the region.
- 2) **Energy cooperation-** The UAE is **only nation** from the gulf region which has strategic **oil reserves stored** in India. An agreement was signed by Indian Strategic Petroleum Reserves Ltd (ISPRL) and the Abu Dhabi National Oil Company to invest in the strategic crude oil storage facility in Mangaluru.
- 3) **Economic cooperation-**
 - a) The UAE is India's **third-largest trading partner** and India's **second-largest export destination**. The bilateral trade between the two countries grew to \$85 billion in 2022-23.
 - b) The UAE is also the **fourth-largest overall investor** in India.
 - c) The **India-UAE Comprehensive Economic Partnership Agreement** aims to increase trade in services to \$115 billion in five years.
 - d) The Indian government has also approved the signing and ratification of a **bilateral investment treaty** with the UAE.

4) **Technical cooperation**- India and U.A.E. have a robust **financial technology** cooperation. For example-

a) The **RuPay card**, a key component of India's Digital Public Infrastructure (DPI), is accepted in the UAE.

b) From July 2023, the **rupee** was accepted for transactions at **Dubai's airports**.

c) India and the UAE have operationalized a **rupee-dirham settlement system** where the Indian Oil Corporation made a rupee payment to the Abu Dhabi National Oil Company for crude oil imports.

5) **Climate change cooperation**-PM Modi attended the COP 28 climate summit held in Dubai. To address the issue of finance, India and the UAE co-launched the **Global Green Credit Initiative**.

What are the areas of divergence between India and U.A.E.?

1) There are challenges like **unclear regulations, labour laws** and transparency faced by Indian businesses' in U.A.E.

2) The UAE and Iran have **territorial disputes** between them. Any escalation in this will affect India's **trade and energy security**.

3) The UAE is home to a large number of Indians. There are so many blue-collar workers and **manual laborers** as well. They face many issues such as **terrible working and living conditions**, and **discrimination** in treatment vis-a-vis other workers.

India and UAE display great convergence and **mutual respect** at all levels. There are certain divergences, but those exist even among the **best of friendly nations**.

On India-France Bilateral Cooperation – What makes the India-France 'strategic partnership' tick

News: The article discusses the areas of cooperation in the India-France Bilateral Relations.

A detailed article on **India-France Bilateral Relations** can be [read here](#).

Background:

French President Macron recently visited India as the Chief Guest for the Republic Day Parade. According to the author, it highlights the personal ties that he and Indian PM have established, and the importance of the Indo-French relationship.

What are the areas of cooperation in the India-France Bilateral Relations?

Shared Values	a. Both countries espouse multipolarity . This forms a natural convergence with India's ambitions of seeking strategic autonomy. b. Both France and India share a common ' civilisation exceptionalism ' (being unique).
Defence Sector	a. Collaboration between Safran and DRDO for producing an aircraft engine for India's 5th generation aircraft with 100% transfer of technology is proposed.

<p>Cooperation</p>	<p>b. 6 Scorpene submarines have been built by Mazagon Dock Shipbuilders Limited with transfer of technology from France.</p> <p>c. Joint exercises between the navies, air forces and the armies have been instituted.</p> <p>d. Agreement for 36 Rafale aircraft was concluded.</p> <p>e. A further acquisition of 3 more Scorpenes with enhanced features of air-independent-propulsion and 26 Rafale M aircraft for India's new aircraft carrier was made.</p>
<p>Space Sector Cooperation</p>	<p>a. Indian Space Research Organization (ISRO) and the French Space Agency (CNES) work on joint missions.</p> <p>b. MoU was signed by NewSpace India Limited, the commercial arm of ISRO, and French satellite launch company Arianespace for collaboration on space launches.</p> <p>c. Both are looking to work together in optimising space defence domain awareness.</p>
<p>People-to-People Contacts</p>	<p>a. The target for Indian students going to France for higher education is now 30,000 by 2030.</p> <p>b. The Young Professionals Scheme under the Migration and Mobility Partnership Agreement is being operationalised.</p> <p>c. UGC's permission for foreign universities setting up campuses in India will ensure French universities can have presence in India.</p>
<p>Economic Cooperation</p>	<p>a. There are nearly 1,000 French companies in India while nearly 150 Indian businesses have established a presence in France.</p> <p>b. France can become an entry point for Indian companies to Europe post-Brexit.</p>
<p>Miscellaneous</p>	<p>a. Joint working groups on agriculture, environment, civil aviation, IT and telecom, urban development, transportation, culture and tourism have been set up over the years.</p> <p>b. Cooperation has expanded to include counter-terrorism, intelligence sharing and cyber-security issues.</p> <p>c. Convergence on global challenges such as climate change, reform of multilateral development institutions, globally beneficial AI, and ongoing conflicts in Ukraine and Gaza is also evolving.</p>

According to the author, the strategic partnership between India and France does not require convergence on all issues, but sensitivity to each other's interests. This is where India-France ties reflect maturity and resilience.

GS Paper 3

Subject: Indian Economy

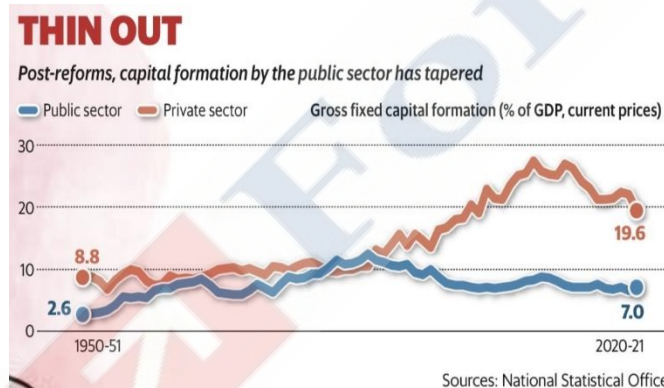
Topic: Indian Economy and issues relating to planning, mobilization, of resources, growth, development and employment

Capital expenditure in India- THE PUBLIC SECTOR GAP In Centre's CAPEX Spree

News: The article discusses the Indian government's increased spending on capital expenditure (building assets like roads and bridges) over recent years. It explores where the money is spent, how it's changing, and its impact on economic growth and private sector investment.

What is the trend of capital expenditure in India?

Significant increase in central government Capex, from ₹11 trillion in 2024-25, nearly 4.5 times higher than in 2014-15. It represents 3.4% of GDP in 2024-25, up from 2% nine years earlier. PSU capex has decreased from well above 10-11% of GDP in the 1980s to around 6-8% in recent years. Significant rise in state government Capex, from 3.2% of GDP in 2011-12 to around 4.4% in 2022-23. Private Sector Capex hasn't fully recovered since the 2008 financial crisis.



Budgetary capex has replaced PSU capex in the last 5 years mint

Year	Central budget capex (in ₹ trillion)	PSU capex (in ₹ trillion)	Total central capex (main government plus PSUs) as % of GDP
2011-12	1.6	2.0	4.1
2012-13	1.7	1.9	3.6
2013-14	1.9	2.6	4.0
2014-15	2.5	4.0	5.2
2015-16	2.5	3.1	4.1
2016-17	2.8	3.4	4.0
2017-18	2.6	6.1	5.1
2018-19	3.1	6.1	4.8
2019-20	3.4	6.4	4.9
2020-21	4.3	4.8	4.6
2021-22	5.9	4.4	4.4
2022-23	7.4	3.6	4.0
2023-24	9.5	3.3	4.3
2024-25	11.1	3.4	4.4

Sources: Budget documents; Ministry of statistics and programme implementation

For information on Capital Expenditure [read here](#)

How is capital expenditure centralized?

- NHAI Funding Shift:** The National Highway Authority of India, previously self-funded, now relies entirely on central government budget allocations. In 2024-25, ₹1.68 trillion of the central government's capex is allocated to NHAI.

2. **Railways Funding Change:** Almost all railway capex for 2024-25, amounting to ₹2.52 trillion, is financed directly through the central government budget, a shift from previous years where railways partly funded their capex.
3. **Overall Trend:** This centralization reflects a structural shift in how capex is financed, increasingly moving away from PSUs and being incorporated into the central government's budget.

Why is there an increase in state government capex?

1. **Rising Tax Revenues:** State governments have experienced strong growth in tax and non-tax revenues, boosting their fiscal capacity for capital expenditure.
2. **GST Compensation:** States received compensation from the central government for revenue losses due to the shift to the Goods and Services Tax (GST) regime.
3. **Special Assistance Scheme:** The central government's scheme offering 50-year interest-free loans for capital investment has significantly contributed to state capex. For 2024-25, this is budgeted at ₹1.3 trillion.

How does government spending stimulate private sector investment?

1. **Government Capex as a Catalyst:** The government's increased spending in capital projects is expected to trigger private sector investment. The hope is that government-led infrastructure development will create opportunities for private companies.
2. **Creating Demand:** By building assets like roads and bridges, the government's capex can generate demand in related industries, encouraging private sector participation.
3. **Healthy Corporate Balance Sheets:** With high profits and stable or improving leverage, corporates are in a better position to invest. The Reserve Bank of India notes that the corporate sector's financial health could lead to increased private investment.
4. **Economic Environment:** The government's substantial capex is intended to create a more favorable economic environment, encouraging the private sector to take over the investment baton in the long run.

Way forward

To sustain economic growth, it's crucial for India to maintain its increased government capex while simultaneously stimulating private sector investment. This requires balancing central and PSU expenditures and enhancing state government capex, supported by strong tax revenues and central government funding schemes.

India's import tariffs- Express View on India's tariff regime: Costs of a barrier

News: This article discusses India's increasing import tariffs since 2014, which are now among the highest globally. High tariffs harm manufacturing and exports, and there's concern about the impact on sectors like electronics and pharmaceuticals.

What is the trend in India's import tariffs?

Since 2014, India has increased tariffs about 3,200 times. The average tariff rose from 13% in 2014-15 to around 18%. India's tariffs are higher than those of China (7.5%), Vietnam (9.6%), and Bangladesh (14.1%).

These high tariffs are in contrast to earlier trends of reducing tariffs from 125% in 1990-91 to 13% in 2014-15.

What are the impacts of high import tariffs?

1. High tariffs disadvantage manufacturers by increasing production costs. It negatively affects India's export competitiveness compared to countries with lower tariffs.
2. Consumers are hurt due to higher prices and limited product choices.
3. Sectors like electronics and pharmaceuticals face challenges due to dependency on imported components, particularly from China. For instance, the electronics sector struggles with higher costs for parts like circuit boards and chargers.
4. High tariffs also affect sectors attempting to diversify away from Chinese supply chains. For example, countries like Vietnam, Thailand, and Mexico, which have lower tariffs than India, become more attractive to manufacturers.

What is the government's recent approach?

1. The government has started rethinking its high tariff policy. It recently reduced the import duty on mobile phone components from 15% to 10%.
2. India is pursuing trade agreements to enhance economic ties and trade. Agreements have been signed with the UAE and Australia, and negotiations are ongoing with the UK.
3. These efforts reflect a more nuanced approach to balancing protectionism with global trade demands.

Way forward

Moving forward, India should continue reducing high tariffs to enhance competitiveness and attract foreign investment. Pursuing more trade agreements, like those with the UAE and Australia, will further open markets. Balancing protectionism with global trade demands is key for India's economic growth and manufacturing sector development.

Changing the Growth Paradigm in India

News: The article discusses the dominant paradigm for growth in India and the issues with it.

Background:

The Governor of the Reserve Bank of India recently said in an open letter to the Union Finance Minister that India's economy is not healthy. To improve the well-being of citizens, they need decent jobs, which the Indian economy has not provided despite impressive growth of GDP.

What is the dominant paradigm for growth in India?

All Indian governments, since the liberalisation of the economy in 1991, have focused on GDP. This paradigm focuses on **increasing the size of the pie before its redistribution**. It has replaced “socialist” models which were concerned with conditions at the bottom. In this model of progress, villages are bad, cities are good; farms are bad, and factories are good.

What is the issue with the current growth model?

- 1) **Inequality:** India is becoming one of the most unequal countries in the world with this flawed model of economic progress. Structural conditions that cause **inequitable growth** have worsened.
- 2) **Environmental Concerns:** With the present model of progress, India must use more fossil fuels to propel economic growth. This has become a bone of contention in global climate negotiations, where all countries are expected to make equal sacrifices to save the global climate.
- 3) **Dependence on Fossil Fuels:** They are required for steel, concrete, plastics, and mobile machinery used for transportation and farming runs on fossil fuels.
 - a. **Usage of Fossils in the Food Industry:** Fertilizers are produced from fossil-fuel feedstock. Farm machinery is made of steel and runs on fossil fuels. Plastics are used for hygienic transportation of food in global supply chains.

Therefore, India must find a new paradigm of progress, for itself and for the world, for more inclusive and environmentally sustainable growth.

What should be the way forward for a new paradigm of growth?

According to the author, the following needs to be done:

1. Retreat of agricultural mechanization.
2. Reduction in the use of synthetic agrochemicals and services.
3. Need for the labor force to leave cities to produce food in the old ways. Purely organic farming would require people to abandon cities and resettle villages.
4. Local systems solutions, cooperatively developed by communities in their own villages and towns, are the way to solve global systemic problems of climate change and inequitable economic growth.

Rather than trying to catch up with rich countries on their historical development paths, India should take advantage of its present realities. India’s policymakers must free themselves from western-dominated theories of economics.

On Reforming India’s Government Procurement System

News: The article discusses the issues with government procurement process in India and suggests reforms to tackle them.

The government and its agencies are large buyers of a wide range of goods and services. Public sector undertakings procure inputs for their production processes and are required to comply with a procurement system.

What are the issues with government procurement process in India?

The procurement system in India has become increasingly rigid. For instance:

- a. Supply bids must be invited with **precise specifications**.
- b. **Prequalification criteria for bidders** are prescribed.
- c. The lowest bidder, or **L1**, must be awarded the contract.
- d. Retendering takes place if only one bid is received.
- e. **Negotiations** in procurement are not allowed.
- f. It is subject to **strict process oversight**, including auditing and vigilance.

What are the implications of this on innovation and startups?

The government cannot purchase new innovative technologies and products from a single monopoly supplier (since retendering takes place if only one bid is received). The consequence is that nothing is bought in the field of innovative frontier technologies (since innovative technologies usually have a monopoly in the initial few years).

This harms innovation as Indian companies and startups may be having the potential for innovation, but they do not have any market openings.

What should be done?

1. **Opportunity for Innovators:** There should be an open window for receiving offers from those who have developed a new product or process.
2. **Forming an Empowered Committee:** This may include experts from outside the organization, which examines all such offers. In case the benefits are significantly higher than the cost, the Committee may then take up the offer, satisfy itself about the claims being made, negotiate to settle the price, and place a trial order.
3. **Relaxing the Oversight Mechanism:** Investigative agencies should not investigate the empowered Committee's bona fide decisions. Failure as well as time and cost overruns are natural in such an initiative and must be accepted to avoid subsequent audit investigations.
4. **Assigning Responsibility:** A firm, consortia, technical institution, individuals or any combination of these could be given the task of finding a solution to a problem based on the real need of the government agency.
5. **Funding:** The effort to be undertaken in a project mode would need to be fully funded by the sponsoring agency.
6. **Negotiated Procurement:** After success, the price at which the product would be purchased would have to be settled through negotiations. There is no alternative to accepting procurement at a negotiated price and trusting the negotiators.
7. **Expanding to all Government Agencies:** Successful work has been done along these lines by the departments of atomic energy, space and DRDO. It should be extended to cover all public procurement.

After this process results in initial success, other players would start to identify a gap, innovate, come up with a solution, and get orders from the government and its agencies. Innovation would then start taking place in the economy.

On the Progress in Achieving SDG Targets – More effort needed

News: The article discusses the progress in achieving SDGs in the Asia and the Pacific region, especially India.

Read in detail about **Sustainable Development Goals (SDGs)** [here](#).

What is the status of achieving SDGs in the Asia and the Pacific region?

According to the UNESCAP’s recent “**SDG Progress Report**” for the Asia and the Pacific region:

1. **Behind the Deadline:** There is a **32-year delay** in attaining the goals, given the current rate of progress. Of the 116 measurable targets, only 11% are set to be achieved by 2030.
2. **Differences in implementation:** There are differences in implementation **across various segments of population**, based on gender, region, education level, and other demographic factors.
3. **Maximum progress:** It has been made on **goals 1 and 9**, i.e. “no poverty” and “sustainable industry, innovation and infrastructure”, respectively.
4. **Negative progress:** Climate action (**goal 13**) has continued to regress in the region.
5. **Positive progress:** The report has commended the efforts of certain countries. For instance, **Vietnam**’s efforts to prioritise technical and vocational education and digitally empower its migrant workers. Also, **Bangladesh** has improved maternal and perinatal-death surveillance and response systems.

What is India’s situation with respect to achieving SDGs?

As per the report, India’s track record is better than that of many of its peers in the region.

Reverse Progress	No Progress	Progress
<p>India saw deterioration on 36 indicators.</p> <p>India endured maximum reversal in progress in zero hunger (goal 2), decent work and economic growth (goal 8), and life on land (goal 15).</p> <p>These include investment in agriculture; suicide rates; treatment of waste-water; international agreements on hazardous waste; fiscal, wage, and social-</p>	<p>India stagnated on 27 indicators.</p> <p>India made no real progress for “life below water” (goal 14). There was either stagnation or reversal in targets under this goal.</p>	<p>India performed well on 85 indicators. Improvements were seen in access to affordable and clean energy (goal 7), industry, innovation and infrastructure (goal 9), and good health and wellbeing (goal 3).</p> <p>For goal 4, i.e. provision of quality education, the country saw tremendous positive strides.</p>

protection policies; expenditure on research and development; expenditure on biodiversity and ecosystems; land degradation; and employment in manufacturing.		
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Overall, India's performance remains mixed.

What should be the way forward?

Focusing on Data Availability: Data unavailability is a major hindrance in accurately measuring countries' advancement on various SDGs.

Avoiding the Middle-Income Trap

News: The article discusses the reasons for countries getting stuck in the Middle-Income Trap. It also highlights the characteristics of High-Income countries and India's status on those parameters.

A detailed article on the **Middle-Income Trap** can be [read here](#).

What are the future projections for India's income levels?

In 2018, the government set a target of achieving a gross domestic product (GDP) of \$5 trillion by 2025. This mark looks likely to be crossed by 2027.

In per capita terms, a \$5 trillion GDP means \$3,600- 3,700 per capita, which is categorised as "lower-middle income" by the **World Bank** (between \$1,136 and \$4,465). "Upper-middle income" is \$4,466- \$13,845, and anything above is considered "high income".

India should become an upper-middle income country by around 2030. However, many nations get stuck within that income band for decades, and some never become high-income.

What are the reasons for countries getting trapped in upper-middle income levels?

1. **Base effect:** This leads to a mathematical slowdown due to a larger base (reference).
2. **Slower Productivity Gains:** Growth also tends to slow since productivity gains become more difficult.
3. **Demographic Factors:** By the time countries hit the high end of upper-middle income, population growth is low, and the workforce is older and smaller.

What are the characteristics of High-Income countries and India's status on those parameters?

Characteristics of High-Income Countries	India's situation
1) Highly educated populations and educational systems, which help improve productivity.	Most of the workforce has less than 10 years of schooling.
2) Good laws and law enforcement, which leads to a safe physical and legal environment.	India has a continuous undercurrent of violence. For instance, Kashmir, Manipur, Chhattisgarh. This can lead to internet shutdowns, which cripple the digital economy.
3) Easily understood, moderate tax codes, applied fairly by honest officials.	India has complicated tax and commercial codes, and corruption is also a prevailing issue.
4) Reasonably good social security provisions.	India has some welfare outreach but low spends on healthcare.
5) Almost all high-income countries are high-end democracies.	India is classified as "Partially Free" and its democracy rankings have deteriorated.
6) Freely convertible currencies.	Due to tight currency controls, we don't have a freely convertible rupee.

What should be the way forward for India?

- Improving Female Labour Force Participation:** India is seeing lower population growth rates. However, India has very low female labour force participation. Hence, it can expand the workforce by inducing more women to work.
- Changing the Business Environment:** A huge legislative and administrative effort to change the business environment of India will be required.
- Improving Democracy Rankings:** Pushing India back up to a "free" status in democracy rankings would also be required.

On the Issues with Services-led Export Strategy

News: The article discusses the issues with services-led export strategy. It also highlights steps that should be undertaken in order to augment India's manufacturing sector exports.

India's economic growth has been led by robust consumption, with net exports acting as a drag. The share of private consumption to GDP growth has been at **55.6%**, while that of net exports has been at **-9.8%** for the past 2 decades ending 2023-24.

In this context, a suggestion is made that India should focus primarily on **high value-added services** rather than **low-value-added manufacturing exports** to boost its exports.

What is the sector-wise performance of India's economy?

- 1) **Rise in Share of Manufacturing:** In the last decade, the share of manufacturing in India's real GDP moved up from 17.3% to 17.7%. India's manufacturing exports comprise 34% of total goods and services exports.
- 2) **Decline in Share of Agriculture:** The share of the agriculture sector declined from 16.5% to 14.4%.
- 3) **Rise in Share of Services:** The services sector rose from 51.1% to 54.6%. India's service exports comprise 42% of total goods and services exports.

What are the issues with a service-led export strategy?

According to the author, service exports can't be an engine of growth due to the following reasons:

1. **Deepen the Formal-Informal Divide:** India's labour market has a large informal component. Increasing service exports will harm the low-skilled workers at the lower end of the manufacturing value chain and thereby deepen the divide.
2. **Mass Employment Generation:** Manufacturing sector employment in India is **11.7% of total employment**. This is lower than in developing countries like Vietnam (21.4%) and China (28.7%). Thus, manufacturing-sector growth is required to generate mass employment.

Thus, according to the author, Indian policy can't afford to focus on service exports at the cost of our current employment-oriented manufacturing thrust.

What should be the way forward for India regarding manufacturing sector exports?

- 1) **Take Advantage of Comparative Advantage:** India enjoys a comparative advantage in the case of textiles and clothing, consumer goods, chemicals, footwear, ores and metals.
- 2) **Favourable Policymaking:** Policies such as 'Make in India' initiative, Production Linked Incentive scheme, Stand-up India, Startup India, National Logistics policy, PM MITRA, FAME India, etc. can transform the manufacturing sector.
- 3) **Focus on Labour-Intensive Sectors:** The share of low-skill manufacturing exports (leather, textiles, etc.) in overall exports is declining. This should be increased.
- 4) **Focusing on Services subsectors:** Wholesale and retail trade, and transportation and storage sectors contribute the most to value added in manufacturing exports. Those components of service exports should be focused upon, so that manufacturing exports also benefit.

On the Positive Signs for Indian Economy – India is well on its way to becoming Viksit Bharat

News: The article discusses the monetary and fiscal policies that point to a phase of steady growth and moderate inflation in the future for India.

A detailed article on **Interim Budget 2024** can be [read here](#).

According to the author, monetary and fiscal policies have put in place conditions for a phase of steady growth and moderate inflation. The Interim Budget has focused on infrastructure development, innovation and connectivity which will lead towards a Viksit Bharat.

What are India's economic projections as per the [Monetary Policy Committee \(MPC\)](#)?

- 1) The forecast for GDP growth in 2024-25 has been kept at **7%**.
- 2) The projection for Headline inflation has been reduced to **4.5%**.

What are the development and regulatory policy changes announced by the MPC?

- 1) **Information Sharing:** RBI has extended the requirement of the Key Fact Statement (which includes information on interest rates and the financial commitment associated with a loan) to cover all retail and MSME loans and advances. This will empower customers to make informed decisions about their borrowing.
- 2) **Technology Initiative for Payment Authentication:** A "Framework for authentication of digital payment transactions" will be explored. Along with this, enhancing the robustness of the [Aadhaar Enabled Payment System \(AePS\)](#) will be undertaken. These initiatives will help in preventing digital frauds.
- 3) **Adoption of CBDC:** Changes proposed in the Central Bank Digital Currency could help people onboard into the CBDC architecture.

What are the positive signs for the Indian economy?

- 1) **Rise in Capital Expenditure:** As per the interim budget, the overall allocation for capital expenditure is equivalent to **5.6% of GDP** and implies a growth of around 13%.
- 2) **Lower Primary Deficit:** It is expected to lower by 80 basis points to 1.5% of the GDP in FY25. In FY21 the primary deficit was more than 5% of the GDP.
- 3) **Debt Reduction:** Public debt as a percentage of the GDP has also reduced and is expected to decline by 90 basis points in FY25 from its level of 58.1% in FY24.
- 4) **Reduction in Fiscal Deficit:** If growth and inflation move along expected lines, the fiscal deficit will be lower than the 5.1% target.

What are the positive signs for the Rural economy?

- 1) **Infrastructure Development:** Significant improvements in physical (road/rail) infrastructure is ensuring seamless last mile connectivity. The integration of cities, urban centres and satellite nodes with far flung rural areas will have to be accounted for in calculating rural demand.
- 2) **Rising Rural Wages:** Median wages of rural labourers during FY14-FY23 (November) have shown a rising trend.
- 3) **Lakhpati Didi Initiative:** The target of increasing the lakhpati didi numbers through the 8.3 million plus self-help groups in the recent budget is also a positive sign for the rural economy.

Restrictions on Paytm Payments Bank

News: The article discusses how the Reserve Bank of India (RBI) created payments banks to reach unbanked people. It mentions Paytm Payments Bank's repeated compliance issues and the RBI's strict regulations for banks to ensure their reliability and protect the economy.

What is Payments Banks?

There are two kinds of banking licenses that are granted by Reserve Bank of India – Universal bank license and differentiated bank license. Payment Banks comes under a differentiated bank license since it cannot offer all the services that a commercial bank offers.

For more information [read here](#)

What are the actions taken by RBI against Paytm Payments Bank?

The Reserve Bank of India (RBI) has imposed restrictions on Paytm Payments Bank Ltd (PPBL) effective after February 29, 2024. These restrictions include:

- 1) Barring PPBL from accepting new deposits or top-ups in customer accounts, wallets, or FASTags.
- 2) Stopping the bank from offering certain services like fund transfers and UPI facilities.
- 3) Directing the termination of Nodal Accounts linked to One97 Communications and Paytm Payments Services Ltd.

Why did RBI take these actions?

The RBI took these actions against Paytm Payments Bank due to ongoing non-compliance and supervisory concerns. Audit reports revealed persistent issues, necessitating strict supervisory action. These concerns raised doubts about the operational integrity of the bank, leading to the imposition of restrictions.

What are the implications of actions taken by the RBI against Paytm Payments Bank?

1. **Disruption of Services:** The RBI's directive halts Paytm Payments Bank's basic banking functions, affecting transactions through UPI, IMPS, and Aadhaar-enabled payments.
2. **Impact on Reputation:** The repeated compliance problems of Paytm Payments Bank have led to actions by the Reserve Bank of India. Such recurring issues and regulatory interventions can significantly damage the bank's reputation. It will undermine public trust and confidence in the banking services. This could have broader implications for its credibility and customer loyalty.
3. **Effect on Related Businesses:** Paytm is involved in more than banking. Problems in the payment bank can negatively influence its other digital payment services, as well.

What should be done?

1. **Enhance Compliance:** Paytm Payments Bank needs to strictly follow RBI's rules to avoid future issues, learning from past mistakes in 2022 and January.
2. **Regular 'Fit and Proper' Assessments:** Continuously evaluate the bank to ensure it meets the RBI's 'fit and proper' standards for credibility and integrity.

3. **Protect Other Businesses:** Given its involvement in digital payments, Paytm must ensure that the bank's compliance issues do not harm its other services.

Internationalisation of government bonds – Significance and challenges

News: In September 2023, J.P. Morgan announced the inclusion of Indian local currency government bonds in its GBI-EM index from June 2024, a significant step for India's financial market. Following this, Bloomberg Index Services in January 2024 proposed adding India's FAR bonds to its index. Now, the focus shifts to FTSE Russell, which has kept India on its watchlist for a potential upgrade, highlighting the anticipation of reforms in India's government bond market by global investors.

What initiatives has the Indian government taken to incorporate government bonds into global indices?

1. **Introduction of the Fully Accessible Route (FAR) in 2020:** This allowed foreign investors to invest in a segment of government bonds without constraints.
2. **Engagement with Global Index Providers:** India's discussions with major index providers like J.P. Morgan and Bloomberg have been pivotal. J.P. Morgan announced the inclusion of Indian bonds in its index in September 2023, followed by Bloomberg in January 2024.
3. **Report by RBI's Inter-Departmental Group in 2022:** This outlined the strategy for integrating Indian LCGBs into global indices and the internationalization of the rupee.
4. **Negotiations on Policy Challenges:** India has been addressing issues such as capital gains taxes and local settlement to make its bonds more attractive to international investors.

What is the significance of incorporating government bonds into global indices?

1. **Attracting Foreign Investment:** Incorporating Indian government bonds into global indices opens the door for significant foreign investment in India's bond market.
2. **Reducing Borrowing Costs:** This move can lower the cost of borrowing for India. The influx of foreign funds into **Local Currency Government Bonds (LCGBs)** tends to reduce domestic interest rates.
3. **Facilitating Financing:** It aids in financing India's fiscal and current account deficits by attracting institutional investors with long-term investment horizons.
4. **Internationalizing the Rupee:** It's a step towards making the Indian rupee a globally recognized and used currency, as shown by RBI's initiative to integrate LCGBs into global indices.
5. **Mitigating "Original Sin" Problem:** By borrowing in local currency, India mitigates the risk associated with borrowing in foreign currencies, which has historically led to financial crises in emerging economies.

Note: Original sin, a concept coined in 1998, refers to the inability of a country to borrow foreign debt in its own currency. This leads to currency mismatches on the balance sheet, especially in developing countries. It affects a country's exchange rate, increases debt costs during economic downturns, and lowers credit ratings, impacting capital flow stability and output volatility.

What are the issues associated with incorporating government bonds into global indices?

1. **Loss of Financial Autonomy:** Including bonds in global indices can reduce a country's control over its long-term interest rates, making it more susceptible to global financial changes.
2. **Increased Market Volatility:** This integration exposes the market to greater volatility, as seen in the aftermath of events like the 2008 Lehman crisis and the 2013 US Federal Reserve policy shift.
3. **Risk of Rapid Capital Outflow:** In times of crisis or uncertainty, foreign investors may quickly withdraw, destabilizing the market. Examples include Malaysia in 2014-15 and Türkiye after 2018, where rapid exits of foreign investors led to currency devaluation and reserve losses.
4. **Exchange Rate Risk:** Local currency bonds carry the risk of currency depreciation, which can lead to increased costs for servicing debt and potential economic instability.

Way forward

To progress, India must balance attracting foreign investment through bond market inclusion with managing potential financial risks. Learning from Malaysia and Türkiye's experiences, India should maintain financial stability while advancing the internationalization of the rupee, as outlined by the RBI's 2022 report.

Capex in the Indian Economy

News: The article discusses India's economic recovery after COVID-19, focusing on increased government spending on infrastructure (capex) and investments. It mentions a rise in exports, improvements in domestic investments, and specific budget allocations for infrastructure, defense, and green energy projects.

What is the current status of capex in the Indian Economy?

1. **Investment Ratio Improvement:** India ranks fourth in the G-20 for investment ratio improvement post-COVID-19, following Mexico, Italy, and South Africa.
2. **Investment Ratio Increase:** India's investment ratio improved to 29.8% of GDP in 2023-24 from 27.3% in 2020-21.
3. **Public Sector Enterprises (PSEs):** PSEs are spending less, with a 10% contraction in capex in 2024.
4. **Reduced Gross G-Sec Borrowing:** With a decrease to ₹14.13 trillion, the lowest in three years, it's expected to improve the private sector's access to funds at potentially lower interest rates.

What are the special provisions for capex in the Budget for 2025?

1. **Record Capex Allocation:** The 2025 budget sets a high capex of ₹11.11 trillion, the highest in two decades, focusing on infrastructure and economic development.
2. **Railway Projects:** A significant portion of the budget is dedicated to railway infrastructure, including the development of three major rail corridors for better logistics and connectivity. Additionally, 40,000 rail bogies will be upgraded to Vande Bharat standards.
3. **Defense Sector Boost:** Defense capex is allocated ₹1.72 trillion, underlining the emphasis on self-reliance (Atmanirbhar Bharat) in defense. This includes new schemes for deep-tech technologies.
4. **Loans and Advances:** The budget plans for loans and advances to jump to ₹1.71 trillion in 2025, supporting state-level capex initiatives, especially in infrastructure.

5. **Housing Expansion:** The budget expands the PM Awas Yojana (Grameen), aiming to add two crore houses over five years, boosting the affordable housing sector and rural infrastructure.
6. **Green Energy Push:** Promoting green energy, the budget includes providing one crore households with 300 units of free electricity per month through rooftop solarisation, fostering solar asset creation in rural areas.
7. **Fiscal Consolidation:** The fiscal deficit target is set at 5.1% of GDP in the FY25 Interim Budget, lower than the expected 5.3%-5.4%, balancing the reduced PSE capex and signifying fiscal discipline.

What are the challenges faced by capex in the Indian Economy?

PSE Capex Slowdown: The PSE capex budget for 2024 was slashed from ₹4.88 trillion to ₹3.26 trillion, leading to a contraction of 10% in spending. This decrease marks a challenge for India's overall capex growth, as the PSE capex to GDP ratio is projected to drop to 1.0% in 2025, the lowest in recent years.

Way forward

The way forward for India involves leveraging its increased capex allocation, particularly in infrastructure and defense, to stimulate economic growth. Continued investment in housing and green energy initiatives is crucial. Addressing the slowdown in Public Sector Enterprises' spending and maintaining fiscal discipline, as evidenced by the lower-than-expected fiscal deficit target, are key to sustaining long-term economic health and development.

On Issues with India's Public Finance – Strategic thinking in public finance

News: The article discusses the issues with India's public finance and highlights steps that should be taken to tackle these challenges.

What are the issues with India's public finance?

1. **Interest Payments:** About 40% of revenue receipts now go to interest payments.
2. **Highly Leveraged:** Over leverage (which demands debt servicing) and operational leverage (commitments to pay wages and pensions) limit the fiscal space for government spending.
Note: Whenever a company or an individual business is termed as over leveraged, it means that the debt on them is more than the equity
3. **Sources of Borrowing:** The bulk of the borrowing of the Indian state comes from financial firms (insurance companies, pensions, and banks) which are forced to buy government bonds. This is called "a financial repression" system.

What is Primary Deficit?

The primary deficit focuses on the difference between government revenues and spending, excluding interest payments. If there is a primary surplus, the debt/GDP ratio will decline.

What should be done?

1) **Voluntary Sources of Borrowing:** Forcible resource mobilisation should be curtailed. This will help build a cadre of private voluntary lenders. This becomes the foundation for enhanced borrowing when faced with a crisis.

2) **Maintain Primary Surplus:** This would create the fiscal space to occasionally run primary deficits, in response to events like a war, a global financial crisis, or a global pandemic.

This will open access to vast resources for the country when faced with a crisis and create a healthy environment for high growth.

Higher tax-to-GDP ratio needed

News: The article discusses the need for maintaining a higher Tax-to-GDP ratio. It also highlights the importance of increasing GST in this regard, and the steps being taken.

A detailed article on **Interim Budget 2024** can be [read here](#).

What are the issues with the Indian economy?

Experts have pointed out that while growth has rebounded after the pandemic, the following are the major issues:

1. High levels of unemployment, especially among the young.
2. Lagging private investments.

In this regard, the government compensated for inadequate private investment by increasing its own investment, however, this puts a strain on the fiscal deficit.

How can the government maintain the high level of investments?

This requires the tax-to-GDP ratio to move to at least 20% in the medium term, compared to the present level of 17-18%.

What would be needed to increase the tax-to-GDP ratio?

This would require GST contributions to move from 6.4% of GDP now to at least 7.5% of GDP. Achieving it would require the average incidence of GST duty to increase from the present 11.8% to the 14.8% that was prevalent in the pre-GST period.

How can GST be increased?

- 1) **Rate Rationalisation:** An increase in the merit rate of 5% and the peak rate of 28%, along with the phasing out of GST exemptions can be implemented.
- 2) **Expanding the Manufacturing Base:** It has to increase as GST collections depend on value addition in manufacturing, which contributes to 65% of the GST collected.
- 3) **Revamping the Services Sector:** The services sector's contribution to GST is only 35%. This is because it largely covers low value-adding units in the informal sector.

What has the government done in this regard?

- 1) A Committee under the Finance Minister of Uttar Pradesh has been constituted for GST rate rationalisation.
- 2) The government has identified new sunrise sectors such as electric vehicles, renewable energy and network electronics, which can contribute to expanding the manufacturing base.

What should the government do about the problem of unemployment?

Government should lower the cost for labour-intensive sectors such as apparel, leather and food processing by bringing down the Custom duties on critical raw materials and components.

Disinvestment in India-Has disinvestment lost priority or got held up?

News: The article discusses India's slow progress in selling government-owned business shares, known as disinvestment. Despite plans to sell more, they have not met their targets.

What is the current status of disinvestment in India?

1. **Disinvestment Target vs. Achievement:** The Indian government planned to raise ₹51,000 crore through disinvestment in 2023-24 but has only achieved ₹12,504 crore so far.
2. **Trend over the Years:** There has been a declining trend in disinvestment targets and achievements. After an initial rise until 2020-21, the targets have been decreasing for three consecutive years.
3. **Comparison with Past Performance:** The government has consistently fallen short of its disinvestment goals, except in 2017-18 and 2018-19.

What are the benefits of disinvestment?

1. **Bridging Fiscal Gaps:** Disinvestment helps in raising funds for the government, aiding in managing fiscal deficits. The article mentions the target of ₹51,000 crore set for 2023-24 as an example.
2. **Enhancing Economic Efficiency:** Private sector participation is believed to bring greater efficiency. The disinvestment of Air India is cited as an instance where such a move can lead to improved business operations.
3. **Promoting Market Discipline:** The exposure of state-owned enterprises to market competition can lead to better management practices and operational efficiency.

What are the reasons for the slow progress of disinvestment in India?

1. **Regulatory and Labor Hurdles:** The process is complicated by regulatory approvals and labor relations, making it a slow and challenging task.
2. **Political Challenges:** There is significant political resistance, with opposition parties criticizing the sale of state-owned enterprises. This political opposition impacts the pace of disinvestment.
3. **Economic Considerations:** The government's approach seems influenced by economic factors, possibly leading to a more cautious stance in selling assets.
4. **Market Conditions:** The disinvestment process is also affected by market conditions, which can vary and impact investor interest in state assets.

5. **Focus on Selective Selling:** The government appears to prefer selling underperforming businesses while retaining profitable ones, affecting the overall pace and scope of disinvestment.

What should be done?

1. The government should better explain the economic benefits of disinvestment to counter political resistance and public skepticism.
2. Focus on selling assets based on their market appeal, rather than just unloading underperforming ones. This includes considering the sale of profitable enterprises.
3. Despite challenges, the government should stay committed to the disinvestment agenda, showing political confidence and determination.

Topic: Inclusive growth and issues arising from it

Reduction in poverty and income inequality in India

News: The article talks about the Indian government's recently released Fact Sheet on the Household Consumption Expenditure Survey (HCES) for 2022-23. It highlights a major reduction in poverty and income inequality in India over the last 11 years.

How has poverty been measured?

Poverty is measured using the World Bank's purchasing power parity (PPP)-based \$1.9 per capita per day line. Adjustments for inflation and rural-urban differences were made to calculate the poverty rates for 2022-23.

For information on Poverty Measurement in India [read here](#)

What does the new government report say about poverty in India?

1. **Dramatic Decline in Poverty:** The new government report shows a significant reduction in poverty in India, from 12.2% in 2011-12 to just 2% in 2022-23.
2. **Poverty Lines Updated:** The poverty lines have been revised to ₹1452 for rural and ₹1752 for urban areas per month, accounting for inflation rates of 5.7% and 5.6% respectively since 2011-12.
3. **Extreme Poverty Nearly Eliminated:** Based on the World Bank's \$1.9 per day poverty line, the report suggests that extreme poverty in India is almost eradicated.
4. **Shift in Higher Poverty Line:** Even with a higher poverty line of \$3.2 PPP, poverty in India decreased significantly from 53.6% in 2011-12 to 21% in 2022-23.
5. **Reduction in Inequality:** The report also indicates a decline in income inequality, with the Gini coefficient from 28.7 to 27.0, and urban from 36.7 to 31.9.
6. **Economic Growth:** This reduction in poverty and inequality has coincided with substantial economic growth in both rural (3.1%) and urban (2.6%) regions.

What does critics say about poverty levels in India?

1. **Skepticism About Poverty Reduction:** Critics were of the opinion that poverty levels hadn't significantly changed over the past 11 years.
2. **Questioning Data Quality:** The skepticism partly stems from the non-release of the 2017-18 Household Consumption Expenditure Survey data, which was cited for poor quality.
3. **Debate on Poverty Estimation:** There is an ongoing debate among experts about the methodologies and data used to estimate poverty levels in India.
4. **Diverse Estimates:** The range of poverty estimates by various entities, from 5% to 20%, using the World Bank's \$1.9 poverty line, adds to the confusion and debate.

Topic: Infrastructure: Energy, Ports, Roads, Airports, Railways etc.

India's dependence on external oil suppliers -Ensuring energy security

News: The article explains that the International Energy Agency (IEA) predicts a rise in global oil demand by 2030. India will be the main driver of this demand.

What are the major findings of the International Energy Agency (IEA)?

The IEA projects global crude oil demand to grow up to the year 2030. India is projected to be the largest driver of this demand growth.

India's oil consumption is expected to increase by almost 1.2 million barrels a day from 2023 to 2030.

This increase accounts for about one-third of the total global crude oil demand growth.

The total global increase in crude oil demand is expected to be about 3.2 million barrels a day over this period.

By 2030, India's oil consumption is projected to reach 6.6 million barrels per day.

What are the concerns for India's dependence on external oil suppliers?

1. **Economic and Security Vulnerability:** India's reliance on external oil suppliers poses a significant risk to its economy and security. Fluctuations in global oil prices can severely affect India's external accounts and fiscal situation.
2. **Inflation and Slowed Growth:** High oil prices can drive up inflation, slow economic growth, and lead to political unrest.
3. **Geopolitical Tensions Affecting Supply Chains:** Fossil fuel supply chains are vulnerable to geopolitical tensions, particularly in West Asia.

What should be done?

1. **Increase Domestic Oil Exploration:** India should focus on discovering and exploiting domestic oil resources to reduce dependence on external suppliers.

2. **Encourage Private Investment:** The government should incentivize private sector investment in oil exploration within the country.
3. **Expand Overseas Operations:** Indian oil companies should be encouraged to operate in foreign countries to secure additional oil supply.
4. **Support Renewable Energy:** Accelerating the installation of solar and wind power capacity will help diversify India's energy sources and reduce oil dependency.
5. **Address Policy Issues:** Policy efforts should prioritize moderating investor risk and maximizing long-term benefits over short-term revenue generation.
6. **Financial and Diplomatic Support:** India should provide financial and diplomatic support to secure its crude oil supply chain, both domestically and abroad.

India's renewable energy (RE) status-Renewable power, when it isn't sunny or windy

News: The article discusses India's efforts to increase its renewable energy capacity to 500 GW by 2030, focusing on solar and wind energy.

What is India's renewable energy (RE) status?

India aims to achieve 500 GW of renewable energy by 2030. So far, 72 GW of solar and 44 GW of wind energy have been installed.

Peak power demand is projected to grow from 240 GW in FY24 to 285 GW in FY28, with deficits of 10-15 GW, mainly in the evenings.

What challenges has India faced in achieving its renewable energy (RE) goals?

1. **Energy Demand Fluctuations:** The country faces fluctuations in demand across different seasons and times of the day, especially peaking in the evenings, requiring a more dynamic energy supply system.
2. **Storage Capacity Constraints:** Adequate storage solutions like batteries and pumped hydro are crucial but currently insufficient, impacting the ability to balance supply with varying demand.
3. **Infrastructure Development Needs:** Building sufficient infrastructure, including transmission systems, is essential to support the expanding renewable capacity.
4. **Reliance on Long-Term PPAs:** The reliance on 25-year power purchase agreements (PPAs) with state discoms is noted. These long-term agreements are crucial for financial stability in renewable projects but may limit flexibility in responding to changing market conditions.
5. **Discoms' Reluctance:** Some reluctance from discoms to fully embrace 'must run' renewable energy. This hesitation can impact the seamless integration and consistent utilization of renewable energy sources into the national grid.

What initiatives has India taken for achieving its renewable energy (RE) goals?

1. **Implementing 'Must Run' Status:** Renewable energy projects, particularly solar and wind, have been accorded a 'must run' status, ensuring their continuous operation except in case of safety issues.

2. **Supportive Government Policies:** Introduction of favorable policies such as late payment surcharge waivers, inter-state transmission system charge waivers, and renewable purchase obligations to boost renewable energy growth.
3. **Increased Competition and Foreign Investment:** The renewable sector has seen a rise in competition among **Independent Power Producers (IPPs)** and an **influx of foreign investments**. This influx of competition and capital boosts innovation, leading to more efficient, cost-effective renewable energy solutions.
4. **Development of Power Exchange Markets:** India is developing power exchange markets to efficiently manage excess renewable energy. These markets enable the sale of surplus power, balancing supply and demand. This not only ensures grid stability but also enhances the financial viability of renewable energy projects.
5. **Innovative Bidding Processes:** Recent bids require renewable energy generators to match hourly demand, enhancing the reliability and comparability of renewable energy to traditional power sources. For instance, in the recent firm and dispatchable RE (FDRE) bids invited by SECI, generators are required to match round the clock (RTC) demand of discoms on a 15-minute basis.

What should be done?

1. **Enhance Storage Capacities:** Increase investment in **storage solutions like batteries and pumped hydro** to manage the intermittency of solar and wind energy.
2. **Strengthen Grid Infrastructure:** Develop robust grid infrastructure to support the increased load from renewable sources and ensure efficient energy distribution.
3. **Promote Diverse Renewable Sources:** Combine different renewable sources, like solar and wind, with storage to provide a more consistent energy supply.
4. **Support Discoms in Transition:** Assist discoms in integrating renewable energy into their systems, ensuring smoother adoption and operation.

Topic: Changes in industrial policy and their effects on industrial growth

Issues with Iron Ore Production - Iron ore faces challenges of sustainability and fairness

News: Issues with Iron Ore Production, The article discusses the issues with iron ore production in Odisha and the recommendations to tackle them.

Background:

The [Competition Commission of India \(CCI\)](#) recently published a report with a view to identify and addressing anticompetitive practices in the country's iron ore sector. According to the author, it will act as a guide to the government's recent announcement of a plan to auction around 500 mineral blocks by fiscal year 2025-26

What are The Findings of The Report Regarding Iron Ore Production in Odisha?

The production of iron ore is concentrated in a few states, such as **Odisha (around 54% of the total)**. Odisha is seen to have a competitive advantage in iron ore mining due to good infrastructure and efficient administrative set-up.

The report highlights that high prices of iron ore in Odisha are affecting the viability of small-scale pellet and sponge iron manufacturers.

Note:

Sponge iron is produced from the direct reduction of iron ore (in the form of lumps, pellets, or fines) into iron by a reducing gas which either contains elemental carbon (produced from natural gas or coal) or hydrogen.

Iron ore pellets are small, hard, spherical particles made from fine iron ore concentrate. They are used in the blast furnace process to produce hot metal.

What is The Issue with Iron Ore Production in Odisha?

1) **Excessive Base Prices:** Base prices for auctions are excessive and have no relation to market realities such as the cost of production.

In some cases, iron ore prices were close to the market price of pellets. This led to the shutdown of some pellet manufacturers.

2) **Lack of Competition:** The practice of private mines using these base prices as a reference price also takes away the possibility of any price-based competition between private mines and government mining company.

3) **Issues with Long-Term Arrangements:** Although LTAs ensure supply consistency, the report has highlighted that due to minimum purchase obligations under LTAs, industries have to also buy low-quality iron ore, as there is no quality-control mechanism in place.

What does The Report Recommend in This Regard?

1. **Transparent Pricing:** The base price for auctions should be calculated through a transparent methodology. This can be done by linking the base price to a price index that should be publicly available.

2. **Auction to prevent Overpricing:** To ensure that iron ore is not overpriced, all quantities produced in the state (by PSUs or private mines) could be sold through an auction.

3. **Regarding LTAs:** Pricing under LTAs also can be linked to a price index, instead of being based on auction prices. Also, the minimum purchase requirements under LTAs should be subject to the required quality or grade of iron ore.

4. **Expanding Access to Iron Ore:** Iron ore production in India is limited to only a few states, and access to it is restricted to industrial customers based in only these states. The report has suggested that it should be made available to industries outside Odisha through LTAs.

The iron ore market study recommendations should be followed to foster competitive neutrality between public and private players, ensuring a level playing field. It will ensure right allocation of non-renewable resources.

India's mobile phone industry-Mobile PLI

News: This article discusses the growth of India's mobile phone industry due to government policies like tax cuts and incentives. It covers the industry's challenges, dependence on imports, and possible future scenarios, including developing local manufacturing and becoming a global player.

What is the current state of India's mobile phone industry?

1. India's mobile phone sector has grown significantly, with exports nearly doubling from \$7.2 billion in 2022 to \$14 billion in 2023.
2. One in four phones produced in India is now exported.
3. The government's reduction of import tariffs on certain mobile phone components from 15% to 10% aims to further bolster this growth.

How have government policies impacted India's mobile phone industry?

Three key government decisions have boosted the industry:

1. A 20% import tax on mobile phones to reduce imports.
2. Lower import taxes on components, ranging from 0-10%, created tax arbitrage, attracting manufacturers to produce locally.
3. The introduction of the Production Linked Incentive (PLI) scheme, offering 4-6% cash incentives based on incremental production, further stimulated the industry.

What are the challenges in India's mobile phone industry?

1. **High Production but Low Investment:** The industry has produced mobile phones valued at ₹4.12 trillion with a relatively low investment of only ₹7,400 crore. This indicates that for every rupee invested, ₹55 is generated in production, suggesting a focus on assembly rather than comprehensive manufacturing.
2. **Reliance on Incentives:** There's a concern about the industry's reliance on government incentives like the PLI scheme. Many manufacturers might reduce or stop production once these incentives are withdrawn, indicating a lack of long-term sustainability.
3. **Dependency on Imported Components:** The industry heavily depends on importing high-end components, which is a significant vulnerability.
4. **Past Instances of Disruption:** Examples like Nokia, which faced major tax disputes and labor issues leading to the closure of its plant, show the potential for regulatory and labor challenges within the industry.

What are the potential growth scenarios of India's mobile phone industry?

1. **Continuation of Current Trends:** India might keep extending incentives like the PLI scheme and further reduce import duties. But this would uphold high production and export figures but wouldn't greatly advance manufacturing depth or technological prowess.
2. **Potential Disruption:** There's a risk that major mobile phone companies could cease their operations in India if they find more attractive incentives elsewhere. A crucial factor that could disrupt the industry is the potential compliance with a World Trade Organization

(WTO) ruling that may require India to reduce its mobile phone tariffs from 20% to zero, challenging the existing tax benefits that have been boosting local manufacturing. Additionally, India's heavy reliance on China for essential mobile phone components could be a significant vulnerability.

3. **Development of a Local Component Ecosystem:** The most sustainable growth scenario involves following Nokia's example to foster a local ecosystem for component manufacturing. By incentivizing companies to produce key components locally, India could reduce import reliance and aim to become a global supplier in specific high-value areas, thereby achieving a more robust and self-sufficient industry.

On Building a Robust Manufacturing Sector – India's true manufacturing rival is Vietnam, not China

News: The article discusses the steps India should take in order to build a robust computer and electronics manufacturing industry.

Background:

The US recently appealed India to make the business environment easier and transparent or risk losing foreign direct investment. Earlier, Japanese Foreign Minister also requested cooperation to improve the investment environment in India.

This is a reflection of the fact that many countries want India to succeed economically in order to build a viable alternative to China.

What should India do to build a robust computer and electronics manufacturing industry?

- 1) **Export-Driven instead of Focusing on the Domestic Market:** Instead of concentrating on the domestic market, it should become regionally competitive and export-driven. A domestic market alone isn't enough to sustain large and complicated electronics supply chains.
- 2) **Recognising Competition:** India should remember that it doesn't hold a monopoly over business migration away from China. Countries, particularly Vietnam and others such as Mexico, Thailand, Indonesia and Czech Republic are also in competition in the computer and electronics sector.
- 3) **Cutting Import Duties:** For more than **85% of the tariff categories within electronics**, India's duties are higher than its competitors. These high import duties lead to companies catering to local consumers but makes them less competitive in the export market. Hence, cutting import duties should be a priority.
- 4) **Provide Other Incentives:** These include tax breaks, dedicated free-trade or industrial zones, discounted utilities like water and electricity, free land and commitments to supply workers.

What has the govt done in this regard?

The government recently reduced tariffs on a range of imported components, including battery covers, lenses, antennae and mechanical parts to 10% from 15%. India should understand that it's competing for investment to drive export manufacturing, and that its business environment doesn't compare well with regional rivals like Vietnam.

Challenges with India's service-driven growth - Why India needs deep industrialization

News: The article discusses India's struggle with industrial growth and high unemployment. It critiques the focus on high-skill, service-based growth, arguing it increases inequality and neglects mass education, which is essential for successful industrialization and overall economic development.

What are the factors affecting India's industrial growth?

1. **Stagnant Manufacturing Sector:** Manufacturing has consistently been below 20% in output and employment for 75 years.
2. **Ineffective 1991 Reforms:** These reforms, aimed at labor-intensive industrialization, failed to significantly boost the manufacturing sector.
3. **High Unemployment:** Persistent unemployment issues, including chronic disguised unemployment, reflect industrial challenges.
4. **Widening Trade Deficit:** Driven by an increase in imported goods, indicating a lack of domestic manufacturing capacity.
5. **Shift to Service-Based Growth:** Since the late 1980s, the focus has been on high-skill, service-driven growth, which hasn't absorbed labor from agriculture effectively.
6. **Neglect of Mass Education:** Emphasis on higher education at the expense of mass schooling has led to a workforce not adequately equipped for industrial jobs.
7. **Cultural Impact on Industrial Growth:** Cultural factors, such as the undervaluing of certain vocational skills (like electrical and welding work), have hindered the development of the manufacturing sector.

Why is deep industrialisation important for India?

1. **Broad-based Employment:** Deep industrialization offers more employment opportunities, absorbing labor from sectors like agriculture, unlike the limited absorption capacity of service-driven growth.
2. **Economic Stability:** A strong industrial base can lead to more stable economic growth and reduce dependence on imports, addressing India's widening trade deficit.
3. **Skill Development:** Industrial growth encourages the development of a wide range of skills, benefiting from a focus on both vocational and higher education.
4. **Innovation and Efficiency:** Deep industrialization fosters innovation, leading to increased efficiency and competitiveness in the global market.

What are the challenges with India's service-driven growth?

1. **Limited Employment Absorption:** Service-driven growth since the late 1980s couldn't adequately absorb labor exiting agriculture, unlike manufacturing.
2. **Requirement for High Skills:** The service sector demands a highly skilled workforce, which India struggles to supply due to educational inequalities.
3. **Increased Inequality:** Service sector growth leads to higher inequality. The Gini index for regular wages in services is 44, compared to 35 in manufacturing.

4. **Neglect of Mass Education:** A focus on higher education over mass schooling contributed to a workforce ill-equipped for service sector jobs.
5. **Elite Dominance:** Higher education institutions fostered elites who advanced in the IT sector but contributed to stagnation in broader industrial areas.
6. **Limited Rural Entrepreneurship:** Compared to countries like China, India's poor human capital endowment in rural areas hampers entrepreneurship, crucial for service sector growth.

What should be done?

1. **Diversify Industrial Strategy:** Instead of solely focusing on high-skill, service-driven growth, India should diversify its industrial strategy to include and boost manufacturing.
2. **Address Educational Inequality:** Tackling the disparity in education quality between rural and urban areas, and among different social classes, is vital to creating a more equitable and capable workforce.
3. **Support Rural Entrepreneurship:** Encouraging entrepreneurship in rural areas can help absorb labor from agriculture and contribute to more balanced economic growth.
4. **Cultural Shift in Work Value:** Cultivating a culture that respects and values all forms of work, including manual and vocational labor, is essential for comprehensive industrial development.

Topic: Government Budgeting

India's Research and Development spending - R&D spend

News: The article discusses India's plan to set up a ₹1 lakh crore fund for long-term (fifty year), interest-free loans to boost private sector research and innovation, especially in new and important sectors (sunrise domains).

What is the current status of India's Research and Development spending?

India's overall research and development (R&D) spending in 2020-21 was ₹1.27 lakh crore.

The private sector's contribution was 36.4% of the **National Gross Expenditure on R&D (GERD)**. In comparison, the central government contributed 43.7%, state governments 6.7%, higher education 8.8%, and public sector industry 4.4%.

Despite absolute increases in R&D spending (from ₹1.1 lakh crore in 2009-10 to ₹1.27 lakh crore in 2020-21), as a percentage of GDP, it declined from 0.82% to around 0.64%.

In the more technologically advanced countries, GERD accounts for at least 1% of GDP. Even Brazil (1.16%) and South Africa (0.83%) have a higher GERD-to-GDP ratio.

What models of Research and Development have other countries followed?

1. **United States:** Adopted **Vannevar Bush's model** focusing on fundamental research to drive technological growth. This approach has been a cornerstone of the U.S.'s post-war innovation strategy.
2. **Japan and South Korea:** Followed a "**techno-nationalist**" path since the late 20th century. This model emphasizes building interconnectedness among universities, research institutes, companies, and governments. It's aimed at fostering a collaborative environment for technological advancement.
3. **Germany, South Korea, and the United States:** Notably high private sector contributions to R&D, with percentages of national GERDs being 67%, 79%, and 75%, respectively, illustrating a **strong private-sector-led R&D model**.

Why is increasing public sector Research and Development important?

1. **Improving Research Quality:** Increasing public sector R&D, especially at the state level, is crucial for enhancing the quality of research facilities in state universities. This helps researchers focus on locally relevant problems.
2. **Bridging Lab to Market:** Higher public sector investment in R&D can help overcome the bottleneck of transitioning research from the lab bench to practical, market-ready applications, fostering innovation.
3. **Stewarding Long-term, Risk-laden Innovation:** Public sector involvement is important for innovations that take decades to develop and involve significant risks, which the state is better equipped to manage than private entities.

What is the challenge with India's new R&D fund?

1. **Effective Allocation:** The challenge lies in how the ₹1 lakh crore will be distributed among various sectors, ensuring effective and strategic use.
2. **Meeting Diverse Demands:** There is a need to address the demands from multiple domains like telecommunications, healthcare, finance, transport, and space flight, all vying for a share of the fund.
3. **Focus on 'Sunrise Sectors':** The finance minister emphasized supporting 'sunrise sectors', but even within these, there are numerous fields, each resource-intensive and requiring significant investment.
4. **Sustainability Concerns:** A major challenge is ensuring that the funding supports innovation that is not only technologically advanced but also environmentally sustainable.

Way forward

India must strategically prioritize the allocation of the ₹1 lakh crore R&D fund to essential 'sunrise sectors'. Establishing robust policy frameworks is crucial for equitable and sustainable innovation. Additionally, enhancing public sector R&D, particularly at state levels, is vital for balanced and impactful technological advancement.

On the Need to Increase Government Expenditure – Wages of inequality

News: The article discusses the trends regarding budgetary expenditure. It also highlights the issues with the current fiscal policy framework of lowering expenditure (in order to lower debt-to-GDP ratio) being followed by the government.

A detailed article on **Interim Budget 2024** can be [read here](#).

What are the trends regarding budgetary expenditure?

1. **Lower Growth in Total Budgetary Expenditure:** In nominal terms, budgeted total expenditure grew by 6.1% over last year. This increase is the lowest in two decades.
2. **Rise in Capital expenditure:** It increased by 16.9% (though less than the increase last year) to Rs 11.1 lakh crore.
3. **Decline in Revenue expenditure:** It has declined by 0.8%.

Thus, according to the author, it is overall a fiscally conservative budget. It also continues to shift the composition of expenditure towards capex as has been the trend in the last few years.

What are the objectives of the present fiscal policy framework?

- 1) **Reducing the level of debt-to-GDP:** The rationale for debt reduction follows from the FRBM review committee recommendations (debt-GDP ratio of the Centre at 40%, currently at 58%).
- 2) **Mitigating the Impact of Expenditure reduction:** Here, the government has tried to shift the composition of expenditure away from revenue towards capital expenditure. This is because it has a greater impact on output (multiplier value).

What does the debt-to-GDP ratio depend on?

The debt-to-GDP ratio of any period depends on two distinct factors.

- 1) **Gap between GDP Growth rate (g) and Interest rate on Borrowings (r):** The greater g is with respect to r, the lower would be the ratio.
- 2) **Primary deficit-GDP ratio:** The lower the primary deficit-GDP ratio, the lower would be the debt ratio.

Note: Primary deficit is the difference between a government's fiscal deficit and the interest paid on the previous year's borrowings.

How can the Primary deficit-GDP ratio be reduced?

- 1) **Increasing the tax-GDP ratio.**
- 2) **Reducing the expenditure-GDP ratio.**

Since the tax-GDP ratio has remained almost the same, the burden of this has fallen on the second option. In other words, the target of lowering the debt-to-GDP ratio essentially means to set a limit on the expenditure growth rate.

What are the issues with this fiscal policy framework?

- 1) **Arbitrary level of debt-to-GDP ratio target:** Debt stability can be achieved even at the present level of debt-to-GDP ratio by registering a growth rate greater than the interest rate.
- 2) **Insufficient to address Developmental Challenges:** In particular, generating employment in productive modern sectors is hindered by lowering expenditure.

What is the employment situation in the Indian economy?

- 1) **Reversal of Trends in Structural Employment Shifts:** Usually, the proportion of workers engaged in self-employment (agriculture, petty retail and traditional services) shrinks and the share of wage workers in the modern sector (manufacturing and modern services) rises. However, the share of regular wage workers in the total workforce declined and then stagnated at 21%. Additionally:
 - a. Self-employed workforce is growing at a much faster rate compared to salaried workforce.
 - b. Women, in particular, have entered the workforce in large numbers, mostly into self-employment.
- 2) **Labour Earnings have Stagnated:** In real terms, regular wages and self-employment earnings have grown at just under 1% since 2017. This indicates a worsening of the income distribution as well as lack of improvements in welfare.

According to the author, addressing this will require government expenditure to rise.

Agricultural sector in India

News: This article discusses how the government's financial plans and budget for 2024-25 seem more focused on showing the government in a positive light, rather than addressing the ongoing problems in agriculture.

What are the special provisions for the agricultural sector in the Budget for 2025?

1. **Growth in Agriculture GDP:** Agriculture GDP in 2023-24 showed a modest growth of 1.8%, a decrease from 4% in the previous year.
2. **Budget Allocations for Agriculture Departments:**

The Department of Agriculture and Farmers Welfare saw a slight increase of 0.6%.
The Department of Agricultural Research and Education received Rs 99.4 billion, a marginal increase of 0.7% over the previous year.
3. **Ministry of Fisheries, Animal Husbandry, and Dairying:** Experienced a significant budget increase of 27%.
4. **Overall Budget Support for Agri-food Sector:**

Includes PM-KISAN, credit subsidy, and PM-Fasal Bhima Yojana, totaling Rs 5.52 trillion for FY25, slightly less than Rs 5.8 trillion in FY24.
5. **Food and Fertilizer Subsidies:**

Food subsidy reduced to Rs 2.05 trillion in FY25, a drop of 3.3% from FY24.
Fertilizer subsidies decreased from Rs 1.89 trillion in FY24 to Rs 1.64 trillion in FY25.

What does the official data show about the agricultural sector in India?

1. **Decline in Agricultural Prices:** Official data indicates a significant decline in agricultural prices, causing a reduction in farmers' incomes. The sectoral deflator in agriculture decreased from 9.4 in 2013-14 to 3.7 in 2023-24.
2. **Slowed Growth of MSP:** The growth of Minimum Support Prices (MSP) for major crops slowed down considerably, from an 8-9% annual increase between 2003-04 and 2012-13 to about 5% between 2013-14 and 2023-24.
3. **Drop in Farmers' Incomes:** Despite a promise to double farmers' real incomes from 2015 to 2022, incomes from cultivation actually fell by about 1.4% between 2012-13 and 2018-19.
4. **Rising Rural Unemployment:** Rural unemployment rates increased, with a notable rise from 2011-12 to 2018-19, and remained higher in 2022-23 compared to 2011-12.
5. **Stagnation of Rural Wages:** Real wages in rural India have not increased since 2016-17 and even decreased after 2020-21.
6. **Lack of Capital Investment:** Capital investment in agriculture and allied sectors didn't increase. Much of the long-term bank credit meant for agriculture was diverted to corporates and agri-business firms as short-term loans.

What are the issues with the government's report on the agricultural sector in India?

1. **Selective Data Presentation:** The government's report emphasizes the increase in agricultural production but neglects the overall decline in growth rates. For example, growth rates dropped from 3.1% annually (2003-04 to 2010-11) to 2.7% (2011-12 to 2022-23).
2. **Ignoring Yield Decline:** The report omits the significant fall in yield growth rates, from 3.3% per year to 1.6% per year in the same periods.
3. **Budget Cuts in Agriculture:** The 2024-25 budget plans to reduce spending in crucial agricultural areas, such as fertilizer subsidies (from ₹1.9 lakh crore to ₹1.6 lakh crore) and rural infrastructure projects.
4. **No Clear Strategy for Growth:** The report and the budget lack a comprehensive plan to revive agricultural growth, with no significant measures to address the ongoing decline.
5. **Unchanged Support Despite Inflation:** The PM-Kisan scheme's allocations remain the same as in 2019, not accounting for inflation, which reduces the real value of cash transfers to farmers.

What should be done?

1. **Rationalize Food Subsidy:** Implement rationalization of the food subsidy system, similar to the strategy used by former PM Atal Bihari Vajpayee in the Targeted Public Distribution System (TPDS). This could save around Rs 50,000 crore.
2. **Redirect Subsidy Savings:** Use the funds saved from food subsidy rationalization for enhancing agricultural research and development, particularly in areas like micro-irrigation.
3. **Reform Fertilizer Subsidies:** Shift from subsidizing the price of urea to direct cash transfers to farmers. This approach is expected to save Rs 30,000-40,000 crore, which can be reinvested in agricultural development programs like PM-KISAN.
4. **Focus on Sustainable Agriculture:** Allocate the saved funds towards sustainable agriculture practices, which is crucial for ensuring food security under the challenges of climate change.

Subject: Agriculture

Topic: Food processing and related industries in India- scope' and significance, location, upstream and downstream requirements, supply chain management

On the Scope of the Horticulture Sector in India – Next step for farmers

News: The article discusses the growing opportunities in the horticultural sector, especially F&V sector in India. It also highlights the steps that should be taken to improve it.

Read more about the **Horticulture Sector in India** [here](#).

According to the author, India has the potential to transform itself into one of the top fruit and vegetable (F&V) sources for the world.

What are the growing opportunities in the horticultural sector, especially F&V?

- 1) **Scope of Agri Exports:** There is a huge opportunity in horticultural exports.
- 2) **Changes in Dietary Habits:** The focus of the Indian diet is shifting from mere calorie security to a nutrition-secure mindset, leading to an increase in per capita consumption of F&V.
- 3) **Technological Advancements:** Digital and technology advancements and increased focus on bio-based and sustainable solutions can solve the challenges of horticulture value chains.
- 4) **Higher Incomes:** Horticulture farming promises higher incomes and offers a steady income stream throughout the year, unlike traditional subsistence farming.
- 5) **Agri-Inputs Sector:** Increase in horticulture production will also unlock immense potential for the agri-inputs sector that comprises seeds, agrochemicals, and fertilisers.

What steps should be taken to improve horticultural production in India?

The issues of **higher productivity, better price realization**, and the **affordability and accessibility of agri-inputs** are crucial. This can be achieved by:

- 1) Focusing on **value-added, export-led businesses**.
- 2) **Integrated value-chain approach** from sourcing to processing.
- 3) **Supply of key agri-inputs** to the farmer can help improve yield.
- 4) **Innovation in Seeds:** Agronomic and genetic seed innovations, including high-quality hybrids, can enhance shelf life and improve access to quality F&V produce. High quality seeds can help extend the geographical footprint for cultivation.
- 5) **1.0 Hectare Model of Integrated Farming:** This cluster-based, whole-farm approach includes multiple interventions such as solar-powered farming equipment, water conservation practices, diversified cropping integrated with livestock, vermicompost, etc., soil health replenishment with natural bio-based agri-inputs, village cluster creation for produce aggregation and exports. It holds the potential to address the challenges of droughts and erratic weather patterns.
- 6) **Specific Approaches for Diverse Agro-Climatic Zones:** A tailored approach to F&V agri-inputs is

needed for India's diverse agro-climatic zones.

Note: An “Agro-climatic zone” is a land unit in terms of major climates, suitable for a certain range of crops.

7) **Multi-stakeholder Partnerships:** Partnerships among farmers, government, customers, industry, and academia/research need to be strengthened to achieve demand-backed production, high productivity, robust credit and risk management, and market linkages.

Topic: Issues related to direct and indirect farm subsidies and minimum support prices

Recommendations of Swaminathan commission

News: This article discusses the demands of protesting Punjab farmers for a law ensuring minimum support prices (MSP) for crops.

[Read extensive coverage of the MSP guarantee here.](#)

What are the demands of protesting Punjab farmers?

The Punjab farmers' primary demand is for a law that ensures the procurement of all crops for all farmers at Minimum Support Prices (MSP). They seek a system where MSP is not just a guideline but a legally enforceable standard.

This demand aligns with the recommendations of the Dr. Swaminathan Commission to some extent but diverges in that the Commission did not recommend a legal guarantee for MSP.

To know who M.S. Swaminathan was [read here](#)

What were the objectives of the Swaminathan Commission?

1. The **National Commission on Farmers (NCF)** was formed under the leadership of agricultural scientist M.S. Swaminathan.
2. The **Commission's 10-point agenda** focused on strategies for food and nutrition security and enhancing the productivity, profitability, and sustainability of farming in India.
3. Between 2004 and 2006, the Commission submitted five reports totaling 1,946 pages. These reports made several recommendations, including some on MSP, but **did not suggest a legal guarantee for MSP or a specific formula for its calculation.**

What recommendations of Swaminathan Commission?

1. **Support for Farm Women:** Establishing a National Board for New Deal for Women in Agriculture under the Union Food and Agriculture Minister, with the Union Ministers for Women and Child Development, Rural Development, and Panchayati Raj as co-chairs.
2. **Farm Schools:** Recommending the establishment of Farm Schools to spread innovative farming methods.

3. **Grain and Fodder Banks:** Proposing the establishment of a grain bank and community food and fodder banks.
4. **Insurance and Soil Testing:** Advocating for promoting insurance and setting up a national network of advanced soil testing labs.
5. **Market Reforms:** Suggesting a code of conduct for contract farming, and amendments in the state APMC Acts and the Essential Commodities Act.
6. **Agricultural Costs and Prices:** The Commission made **suggestions for the Commission for Agricultural Costs and Prices (CACP)**, which recommends MSPs, to consider various factors in deciding the level of MSP, including the weighted average cost of production and risk factors.
7. **Minimum Support Prices (MSP):** Recommending timely issuance and better implementation of MSP across regions, but not supporting the specific formula of C2 cost plus 50%.

What are the different commission recommendations on Minimum Support Prices?

Swaminathan Commission

1. **Timely MSP Issuance:** Emphasized the need for prompt declaration of MSP, especially for Kharif crops.
2. **Improving Implementation:** Recommended improving MSP implementation across different regions.
3. **Abhijit Sen Committee** (High Level Committee on Long Term Grain Policy, 2002)
4. **Cost Calculation Method:** Suggested that the CACP should base MSPs on C2 cost of production (including imputed costs) in more efficient regions.
5. **A2 + FL Costs:** Recommended that CACP also indicate its estimates of A2 + FL costs for high-cost regions.

Commission for Agricultural Costs and Prices (CACP)

1. **Cost of Production Consideration:** Advised that MSP should be based on the weighted average cost of production, considering variability between regions and farmers.
2. **Exclusion of Risk and Post-Harvest Expenses:** Noted that risk factors and marketing and post-harvest expenses are not considered in the MSP determination process.

Way forward

To address the ongoing agricultural crisis, a balanced approach is needed that combines the Swaminathan Commission's recommendations with the current demands of farmers. This includes legally ensuring MSP, enhancing productivity, and improving market reforms while focusing on sustainability and support for farm women and innovative farming practices.

On Legalising MSP in India

News: The article discusses the issues with legalising MSP in India.

Background:

The government is left with less options to fulfill the demand of the protesting farmers for a legal guarantee of Minimum Support Price (MSP), given the latest attack by an influential group of 19 agri exporting countries.

The **Cairns Group** - comprising Australia, Brazil and Canada among other members – have claimed that India's **public stockholding (PSH) programme** is **highly subsidised**. So, the farm support that India gives is **distorting global food prices and hurting food security of other countries**.

What is the WTO 'Peace Clause'?

Currently, India cannot be dragged into a dispute over its subsidies as it is protected by the 'Peace Clause' that was agreed during the Bali ministerial in 2013. However, India is open to face disputes. Because of the peace clause there is no restriction on what the level of MSP or the level of procurement should be.

What are the issues with legalising MSP?

1) **WTO Compliance:** If new schemes are to be implemented, then for those products India will have to comply with the 10% subsidy ceiling (under [WTO's Agreement on Agriculture](#)) and it will not be protected under the 'Peace Clause'.

This means that an MSP law will not be covered under the peace clause that gives India protection from legal disputes at the WTO.

2) **High Burden on Exchequer:** Experts have pointed out that there will be materially high expenditure if the government agrees to the farmers' demand for an MSP law.

Note: India's per farmer subsidy is very low. However, WTO rules are not based on per-farmer subsidy. India's subsidy to farmers comes in at \$300 per farmer, compared to \$40,000 per farmer in USA.

On Recent Farmers' Protest Demands – Farm reforms remain a challenge yet to be met

News: The article discusses the demands of the recent farmers' protest. It also highlights the issues with the government buying farm produce and the steps that should be taken in this regard.

Background:

Farmer groups from Punjab have recently clashed with police and threatened to storm Delhi just before the national polls.

What are the demands of the farmers?

- 1) India's withdrawal from the World Trade Organization and freezing all free-trade pacts.
- 2) Reinstating of the Land Acquisition Act of 2013.
- 3) Pension of ₹10,000 a month for every farmer aged above 60.
- 4) The limit on rural job-guarantee work-days to be doubled to 200 and its daily wage upped to ₹700.
- 5) Dropping of all cases against last time's protestors.
- 6) Law to back minimum support price (MSP) for all commodities as a government assurance.

What are the issues with government buying farm produce?

The government is a bulk buyer of foodgrain and other farm produce to offer free or cheap food to the masses. However, this leads to:

- 1) Distortion of cropping patterns.
- 2) Incentivizing the overproduction of carbohydrate-heavy crops like wheat and rice.
- 3) It ignores the changing food habits of people. For instance, people may want protein-rich edibles and vegetables cheapened by better acreage and cold chains (for perishables).

What should be the way forward?

- 1) **Aligning Farm Incentives with Market Forces:** For evolving dietary demands of the people to be satisfied more efficiently, farm incentives must be aligned better with market forces. For this, old restrictions must be eased, and markets should have multiple buyers.
- 2) **Focusing on Reforms Instead of Legalising MSP:** MSPs for mandatory state procurement should not be legalised, since markets cannot function properly with price floors and caps. Farms reforms are the way forward.
- 3) **Governments should not Control Agri Exports:** Another sign of the Centre's comfort with state-controlled farming is the recent export bans imposed on non-basmati rice and onions. These moves deprive farmers of a chance to maximize earnings.

On Raising Farm Incomes – Policies favour the consumer, not the producer

News: The article discusses the demands of the ongoing farmers' protest. It highlights the implications of accepting these demands and the steps to raise farm incomes in India.

A detailed article on **MSP Guarantee Law and Farmer's Protest** can be [read here](#).

Background:

Farmers protesting on Delhi's borders are demanding to make minimum support prices (MSPs) legally binding and fixing the MSPs according to the **Swaminathan formula** (50% profit over comprehensive cost, often referred to as Cost C2).

What is the Cost C2 formula?

This cost concept includes not only all the paid-out costs of farmers and value of family labour (Cost A2+FL), but also the rent on owned land and the interest on owned capital. The difference between Cost A2+FL and Cost C2 is roughly 25 to 30% for most crops. The current MSP formula that the government has accepted is minimum 50% margin over Cost A2+FL. If this is replaced by Cost C2 plus 50% margin, in most crops covered under MSP regime, the MSPs will go up by 25 to 30%.

What will be the implications?

1. Raise the Fiscal Deficit.

2. Raise Food Inflation.

3. Similar Demands from other Sectors: If the government agrees to raise the MSP (based on Cost C2), and make it legally binding, then milk producers, livestock producers, and horticulture producers will also demand the same treatment.

What should be done to increase farmers' incomes?

1) Focusing on Livestock, Fisheries and Horticulture Sector: These sectors need a **well-integrated value chain** approach. For instance, the Amul model in milk or the vertically integrated poultry sector.

2) Raising Agricultural Productivity: The best way to raise farmers' incomes in the 23 MSP crops is to raise productivity in a sustainable manner. This requires investments in agri-R&D and irrigation.

3) Ensure Access to Markets: Access should be enabled to markets not only in India but across the world. This can be achieved by:

a. Remove all bans on agri-exports.

b. Remove stocking limits on private trade.

c. Stop selling wheat and rice in the open market at below the economic cost of the Food Corporation of India (FCI).

4) Rethinking Consumer-Centric Subsidies: India's agri-food policies are highly tilted towards consumers at the cost of farmers. For instance, 80% subsidies currently are geared towards consumers to keep food prices low.

Instead, according to the author, 75% of the subsidies should be focused on producers (in the form of a **price stabilisation fund** or PM-Kisan).

Topic: Storage, Transport and Marketing of Agricultural Produce, Issues of Buffer Stocks and Food Security.

Government's new grain storage plan to be executed by cooperatives

News-The article discusses the importance of cooperatives in storage of food grains.

What is the state of food grain storage in India?

The Food Corporation of India currently has a storage capacity of 361.62 lakh tonnes and state government agencies have capacities of another 400.74 lakh tonnes.

What is the world's largest grain storage plan?

The pilot project will be carried out in 11 states by primary agricultural credit societies. The government aims to build storage capacity of 700 lakh metric tons which is almost **double the existing storage** capacity in the country.

A detailed article on **World's largest grain storage plan** can be [read here](#).

What are the benefits of an increase in storage facilities?

- 1) It will **cut down losses** due to lack of adequate infrastructure.
- 2) It will enable farmers to **sell their output at an opportune time** in terms of prices.
- 3) It points towards the **increasing emphasis of the government on cooperatives**.

What is the importance of primary agricultural credit societies?

1) **Large network of societies**- As per **Reserve Bank of India's report**, there are 1.02 lakh societies in the country at the end of March 2021.

These societies have a sizeable presence in the western part of the country, serving 13.7 crore members and 5.4 crore borrowers.

2) **Empowerment of small farmers**- The data shows that small and marginal farmers and others accounted for **81 per cent of these 13.7 crore** members. Around 60 per cent of lending of district central cooperative banks is through these societies.

3) **Collective Strength**-They operate through group/collective strength ensuring that no one is left behind. For ex: **Amul and Lijjat Papad**.

What are the steps taken by the government to promote primary agricultural credit societies?

1) **Establishment of new cooperatives**- The government aims to establish two lakh primary agricultural credit societies (PACS) and dairy and fisheries cooperatives in the country.

2) **Modernization of PACS** -The Union Budget 2023-24 has started the process of computerization, 63000 PACS with an investment of Rs 2,516 crore.

3) **Creation of separate ministry**- The government has created a dedicated ministry namely **Ministry of Cooperation** for promoting cooperative societies in India.

Reasons for the increase in the import of edible oil in India -Finding the right policy for edible oil

News: This article discusses India's struggle to become self-sufficient in edible oil production. Despite efforts and policies, there's still a large gap between domestic production and demand, leading to heavy reliance on imports. The article suggests revising government policies to support local oilseed farmers better.

What is the current state of India's edible oil production?

India imports over 60% of its edible oil needs.

Production grows by about 2.2% annually, but demand increases almost twice as fast, at 4.3%.

From less than 1.5 million tonnes in the mid-1980s, imports swelled to 16.71 million tonnes in 2022-23, making edible oil India's third-largest import.

What are the reasons for the increase in the import of edible oil in India?

1. **Heavy Reliance on Imports:** Over 60% of India's edible oil needs are met through imports.
2. **consumer-centric Policies:** Government policies have been more consumer-focused, with interventions like limiting stock and trade, and lowering import tariffs (5.5%). These policies harm local producers' interests and discourage them from expanding oilseed cultivation.
3. **Economic and Social Factors:** Growing urbanization, rising population, and higher income levels have contributed to the increased demand for edible oils.
4. **Limited Domestic Growth:** Limited Domestic Growth: Despite potential, there's a significant gap in actual and attainable yields in oilseeds, averaging 60%. This gap indicates underutilized capacity and inefficient farming practices, contributing to insufficient domestic production.

What efforts have been made by India for self-sufficiency in edible oil?

1. **Formulation of Strategies:** Union Finance Minister Nirmala Sitharaman announced plans to formulate a strategy for self-reliance in edible oils in her budget speeches, including the Interim Budget speech of the current year.
2. **Research and Modern Farming:** The strategy includes research on high-yielding crop varieties and the widespread adoption of modern farming techniques.
3. **Market Linkages and Value Addition:** Efforts to establish market linkages, procurement, and value-addition for oilseeds.
4. **Crop Insurance:** Initiatives for providing crop insurance to oilseed farmers.
5. **Past Success with the Oilseed Technology Mission:** The setting up of the Oilseed Technology Mission in 1986 led to a period of near self-reliance in the early 1990s, known as the "yellow revolution".

For more information read [Artical1](#), [Artical 2](#)

Way forward

To move forward, India should revise its pricing and trade policies to incentivize local oilseed production, reducing the heavy import dependency of over 60%. Learning from the success of the 1990s Oilseed Technology Mission, the focus should be on making oilseed cultivation more economically rewarding.

Topic: Land reforms in India

Land in India causing inequality

News: The article discusses how land in India is unfairly used, causing more inequality. It talks about three issues: landowners making money without productive use, the government owning but poorly managing land, and the misuse of shared natural resources, harming the environment and communities.

How is land in India causing inequality?

1. **Unequal Returns from Land Ownership:** Wealth from land in India often comes from scarcity rents rather than productive use. For example, in Mumbai, former textile mills and factories were transformed into expensive real estate for the wealthy, not the common people.
2. **Government Land Mismanagement:** The Indian government, as the largest landowner, is inefficient in managing its land. Significant amounts of government land in major cities, like the prime locations occupied by elite clubs in Delhi, are used for the benefit of the rich instead of addressing urban housing issues.
3. **Exploitation of Common Lands:** Common lands, meant for public use, are frequently encroached upon for projects favoring the affluent. This includes environmental degradation in areas like the Western Ghats and exclusive access to natural resources, adversely affecting local and indigenous communities.

What should be done?

1. **Reform Land Ownership:** Shift focus from earning through land scarcity to productive use. This can prevent wealth concentration among a few landowners.
2. **Improve Government Land Management:** The government should effectively manage its vast land holdings to benefit the broader population. For instance, using government land in cities to reduce slums.
3. **Protect Common Lands:** Ensure common lands are used for the collective good, not just for the rich. This involves preventing environmental degradation and maintaining equitable access for all communities.
4. **Promote Inclusive Policies:** Develop policies that encourage equitable land distribution and use, supporting inclusive growth rather than catering to the wealthy minority.

Subject: Science & Technology

Topic: Developments and their applications and effects in everyday life

AI reshaping merit and the idea of meritocracy- Recalibrating merit in the age of Artificial Intelligence

News: The article discusses how meritocracy, where people succeed based on ability and effort, is changing. It explores different views on meritocracy's impact, focusing on its problems and potential reforms. It also examines how AI complicates meritocracy by affecting jobs and increasing inequality.

What is meritocracy?

Meritocracy is a system where people's success is based on their abilities and effort, not their background.

How will AI be reshaping merit and the idea of meritocracy?

1. **Redefining Human Merit:** AI introduces non-human capabilities surpassing human intelligence in tasks and creativity, as shown by OpenAI's Sora, making traditional metrics of merit less relevant.
2. **Technology Access as Merit:** Individuals with AI tools have an advantage, shifting merit to technology access rather than personal abilities.
3. **Perpetuating Biases:** AI, trained on historical data, can reinforce existing biases in hiring and other fields, disadvantaging marginalized groups.
4. **Job Displacement:** AI's advanced capabilities, like early cancer detection as mentioned in a Nature Medicine paper, can replace skilled jobs, impacting both high and low-wage sectors.
5. **Polarization of Workforce:** AI pushes jobs towards high-skill, high-wage roles or low-skill, low-wage roles, increasing socioeconomic disparities.
6. **Opaque Decision-making:** The unclear nature of AI decision-making processes makes it hard to understand and challenge merit evaluations, undermining meritocracy's transparency.

Way forward

To move forward, we need to redefine merit in the AI era, ensuring fair access to technology and education. Addressing AI's biases and promoting transparency in AI decision-making are crucial. We should also focus on balancing workforce opportunities, supporting both high-skill and accessible low-skill jobs to mitigate socioeconomic disparities.

On RBI's Central Bank Digital Currency (CBDC) - Digital future

News: The article discusses the CBDC-R pilot project being run by RBI. It also highlights the improvements being made in the CBDC by RBI and the benefits due to these improvements.

A detailed article on **Digital Rupee** can be [read here](#).

Background:

Reserve Bank of India (RBI) has been issuing the central bank digital currency (CBDC) on a pilot basis since late 2022. Based on blockchain technology, in the retail segment, CBDC-R was launched for a closed group comprising participating customers and merchants.

What is the CBDC-R pilot?

The CBDC-R pilot currently enables person-to-person and person-to-merchant transactions using digital rupee wallets.

What are the improvements being made in the CBDC by RBI?

- 1) **Programmability:** It will permit users like government agencies to ensure that payments are made for defined benefits. This means that certain built-in rules will impose restrictions on the usage of money.
- 2) **Offline functionality:** It will enable transactions in areas with poor or limited internet connectivity.

This could not only increase the adoption of the digital currency but also help attain public policy goals.

What are the benefits?

- 1) **Desired Spending:** The government would be able to ensure that the money is used for the intended purpose. For instance, if the government is making transfers to school students in the digital currency for buying books, it will be used only in bookshops.
- 2) **Reduce the Risk of Fraud:** Such functions can also be used by private firms to meet specified expenditures like fuel costs and business travel expenses of employees.
- 3) **Improve Spending Efficiency:** If properly implemented, this can improve the spending efficiency of the government and enhance citizens' welfare.

For instance, the digital currency will augment cash transfers with a fair amount of certainty that the money will be used for the intended purpose.

What are the challenges?

- 1) **Time Requirements:** Implementing such programmes on scale will take time.
- 2) **Digital Literacy:** The use of the CBDC requires basic digital literacy and access to a mobile phone.

On Building Sovereign AI in India – India's challenge

News: The article discusses India's potential advantages and upcoming challenges in the field of AI, especially Generative AI (GenAI).

A detailed article on **Generative AI (GenAI)** can be [read here](#).

Background:

For India, the 5th-largest economy, aspiring to become the 3rd-largest, not building sovereign capabilities in AI would be a huge mistake. According to the author, India needs to build sovereign AI, including sovereign generative AI (GenAI) capabilities.

What have been the announcements by the government in this regard?

- 1) Last year's Budget contained reference to 3 Centres of Excellence for AI.
- 2) Plans to spend Rs.10,000 crore to set up India's own GPU cloud infrastructure.
- 3) NITI Aayog has brought out papers on what can be done in AI in India.

What are India's advantages in the field of AI?

- 1) **Generation of Large Amounts of Data:** AI (and GenAI in particular) needs large amounts of data to train its models properly. India is the 2nd-largest generator of digital data in the world.
- 2) **IT industry's Capabilities:** The IT industry's growing capabilities in building applications will certainly be an advantage.

What are the challenges for India in the field of AI?

1. **Lack of Research:** The US and China are clear leaders in this field, with decades of AI research behind them. India has only started.
 2. **Human Resources:** To be able to build any significant AI research centre, the government as well as the private sector needs to attract experts (such as Indian-origin experts in foreign countries) in the field to come and lead the effort, just like China.
 3. **Lack of Graphics Processing Unit (GPU) Cloud Infrastructure:** However, this problem can be tackled as there are plenty of cloud service providers globally.
- Note:** A GPU is a computer chip that renders graphics and images by performing rapid mathematical calculations.
4. **Large Requirement of Electricity (and Water):** Gen AI models require large amount of these resources, and the demand for energy will keep going up as GenAI progresses. India's energy demand projections will have to include the GenAI factor in its energy transition journey.

On Concerns Associated with the Neuralink

News: The article discusses the ethical and legal concerns associated with Neuralink.

A detailed article on **Brain-Computer Interface** can be [read here](#).

Background:

Elon Musk announced recently that the first human implantation of the [Neuralink device](#) – called Telepathy – has been achieved and the recovery and initial data collection are in progress and going well.

What is Neuralink?

Neuralink is a tech startup, and its product is a chip that is a surgically implantable device. It can record a massive amount of data from individual neurons and transmit it to a computer, which in turn can read the intention coded in that data to execute a certain task.

What are the intended objectives of Neuralink?

- 1) **Short-Term: Controlling Digital Devices:** It will give people affected by paralysis the ability to control digital devices through thought and intention. This will be helpful for a clinically and neurologically disabled population.
- 2) **Long-Term: Creating a Brain-Computer Interface:** It aims to “create a generalised brain interface to unlock human potential.” In other words, to change and enhance cognitive abilities (the brain's ability to perform core tasks like thinking, memorizing, visualizing, interpreting surroundings) in healthy humans.

What are the ethical and legal concerns arising out of this?

- 1) **Safety Concerns:** The recording electrodes as part of the chip in the brain may lead to micro-injuries in the brain. This may lead to microbleeds, strokes or other forms of brain injuries, and cause serious neurological conditions such as neurodegeneration.
- 2) **Ethical Concerns:** Data ownership is an extremely important ethical issue. There is no clarity on who the recorded data belongs to – the subjects or Neuralink.
- 3) **Lack of Transparency:** Replicability and the scrutiny of the raw data from the scientific community is important for any scientific innovation. However, there has been mystery over the development of Neuralink and pre-clinical testing results.
- 4) **Outside Regulatory Oversight:** Its clinical trial has not been registered (at clinicaltrials.gov). Due to this, it is difficult to determine the conditions under which these trials will be conducted.

What should be the way forward?

Neuralink should be more open about the data it generates and about its device since secrecy does not instill confidence and trust.

Express View on India's CAR T-cell therapy

News: India has approved a new CAR T-cell therapy developed at Tata Memorial Centre and IIT Bombay. This therapy customizes T-cells from the patient's body to fight cancer.

What is CAR T- cell?

Chimeric antigen receptor (CAR) T-cell therapies represent a quantum leap in the sophistication of cancer treatment.

For more information [read here](#)

What is CAR T-cell therapy?

CAR T-cell therapy is a personalized cancer treatment. It involves taking a patient's own T-cells, a type of immune cell, and modifying them in a laboratory to target cancer cells. These enhanced cells are then put back into the patient's body to fight the cancer. This method has shown success in treating advanced leukemias and lymphomas. In India, a 64-year-old former army doctor became cancer-free after receiving this therapy, marking a significant achievement.

For more information [read here](#)

What are the benefits of the new CAR T-cell therapy developed by India?

1. **Targeted Therapy:** CAR T-cell therapy involves modifying a patient's T-cells to target and fight cancer cells specifically.
2. **Effective Against Advanced Cancer:** It has shown success in eradicating advanced leukemias and lymphomas, as evidenced by the treatment of a 64-year-old former army doctor in India.
3. **Less Harsh than Chemotherapy:** This therapy is less demanding and has fewer side effects compared to traditional treatments like chemotherapy.
4. **Affordability in India:** In India, this therapy costs about Rs 40 lakh, which is about a tenth of its cost in the US, making it a more affordable cancer treatment option in the Indian context.
5. **Customized for Each Patient:** The treatment is personalized, with T-cells being grown and modified for each individual patient.

On R&D Funding and Deep Tech – Why the Union Budget's plans for deep tech and research funding are significant

News: The article discusses the importance of Deep Tech and highlights the government's initiatives in this regard. It also states the challenges in the funding of Deep Tech projects.

Background:

The Interim Budget included an announcement of a Rs 1 lakh crore fund to provide long-term, low-cost or zero-interest loans for R&D. A new scheme to strengthen deep-tech capabilities in the defense sector was also announced.

What is Deep Tech?

Deep tech refers to advanced and disruptive technologies that have the potential to cause transformative change and provide solutions for the future. It is used to describe cutting-edge research in nanotechnology, biotechnology, material sciences, quantum technologies, semiconductors, artificial intelligence, data sciences, robotics, 3D printing, etc.

What is the importance of Deep Tech?

1. These technologies can help **address complex global challenges like** climate change, hunger, epidemics, energy access, mobility, physical and digital infrastructure, and cyber security.
2. They can also **enhance productivity** and drive economic growth and create jobs in coming years.
3. There are also associated benefits in **terms of spin-off technologies** (tech derived from a parent technology), trained manpower, entrepreneurship and technology exports.

With its large base of relatively high-quality science and engineering manpower and a well-established technology culture, India can be one of the frontrunners in Deep Tech.

What has the government done in this regard?

The government has tried to incentivize research in these areas by the following:

- 1) **National Mission on Transformative Mobility and Battery Storage.**
- 2) [National Quantum Mission](#).
- 3) [National Deep Tech Startup Policy](#): A policy framework to create an enabling environment for companies working in these technology areas was finalized.
- 4) [National Research Foundation \(NRF\)](#): Rs 1 lakh crore corpus to finance R&D. Startups and other private sector ventures are expected to be the main beneficiaries.

However, there have been only nominal increases in budgetary allocations of India's science and research departments in the Interim Budget.

What are the main provisions of the National Deep Tech Startup Policy?

The policy seeks to address specific challenges faced by technology startups and provide them with a platform to compete and collaborate with the best in the world.

It talks about the following:

- a) Create opportunities for long-term funding;
- b) A simplified but stronger intellectual property rights regime;
- c) Tax incentives;
- d) A conducive regulatory framework;
- e) Development of standards and certifications;
- f) Nurturing of talent;
- g) Linkages between industry, research centers, and educational institutions.

What are the challenges in the funding of Deep Tech projects?

- 1) **Capital-Intensive Sector:** Most deep tech projects are time- and money-intensive, with relatively high funding requirements.
- 2) **India's Low Expenditure on R&D:** It is far below the global average, and significantly lower than the scientifically advanced countries. India currently spends just about 0.65% of GDP on R&D. The global average is about 1.8%.
- 3) **Lack of Private Sector Participation:** Expectations of the infusion of private sector money into research have been disappointing. Finance has been both unpredictable and inadequate.

4) **Bureaucratic Delays:** Even where funds are available, delays and interruptions in disbursement often affect projects. Complex bureaucratic requirements contribute to delays.

On HAPS (High-Altitude Pseudo-Satellite vehicles)

News: The article discusses HAPS (High-Altitude Pseudo-Satellite vehicles) and its applications and advantages. It also highlights the engineering challenges in developing HAPS?

Read more about **High-Altitude Pseudo-Satellite vehicles (HAPS)** [here](#).

Background:

Last week, the Bengaluru-based National Aerospace Laboratories (NAL) successfully flew a prototype of a new-generation unmanned aerial vehicle (UAV) that is being seen as a huge technology breakthrough.

Why was this UAV different?

It can fly at great heights, about **20 km from the ground**. It runs entirely on **solar power** and can remain in the air for months.

Such UAVs belong to a class of flying objects called **HAPS (high-altitude pseudo-satellite vehicles)**, or **HALE (high-altitude long-endurance vehicles)**.

HAPS are meant to fly in the stratosphere (region between 17 and 23 km above the earth's surface) since wind speed is very low and ideal for light-weight aircraft to remain stable.

No country has mastered this technology yet. However, the successful test flight shows that India has capabilities like some other countries trying to develop this technology.

What are the possible uses of HAPS?

- a. Surveillance and monitoring.
- b. Disaster management.

Why are HAPS better than currently available technologies?

1) **Comparison with Drones:** Normal UAVs, or drones are mostly battery-powered and cannot remain in the air beyond a few hours. They fly at relatively low levels, because of which their vision is restricted to small areas.

However, it can easily keep an eye over 200 sq km of area.

2) **Comparison with Satellites:** Satellites in low-earth orbits are continuously moving with respect to Earth. They cannot constantly keep an eye on the target area. Geostationary satellites (36,000 km above the ground) can keep a constant gaze over one area but are expensive, and once deployed, cannot be repurposed or reoriented.

However, HAPS can be easily redeployed over another location, or can be reequipped with a different payload.

What are the engineering challenges in developing HAPS?

- 1) **Solar Power issue:** The biggest challenge is to generate enough solar power to keep the aircraft flying, the payloads operating, and the batteries charging.
- 2) **High Battery Density Required:** Because of limitations of space and weight, solar cells and batteries need to have very high efficiency (in terms of energy density - the amount of energy stored in a battery in proportion to its weight).
- 3) **Design-related challenges:** The aircraft needs to be extremely lightweight to minimize the power requirement, but it also has to be stable at the same time.
- 4) **Low Temperatures:** Temperatures in the stratosphere can drop to -50 degree Celsius or lower. Electronics need to be kept warmer, and this forms an additional burden on power resources.
- 5) **Low Air Density:** Air density in the stratosphere is just about 7% of what it is at sea level. That creates complications in producing lift and thrust.

The AI opportunity

News: The article discusses the advantages India possesses in the field of AI. It also highlights the positive prospects and challenges it entails.

Background:

Recently, Microsoft's CEO gave a statement on skilling up 2 million Indians in the use of artificial intelligence (AI). This signals their desire to shape the Indian AI ecosystem in a big way.

What are the advantages India possesses in the field of AI?

1. **AI Engineers:** The Indian IT services sector is witnessing the lowest fresh hiring in decades. The surplus engineers could now migrate to the AI field as investment in this space is expected to increase.
2. **Diversity of Languages:** There are 8-10 Indian languages with over 50 million speakers each and a rich vernacular literature. These could lead to the development of many variations on ChatGPT set in various Indian languages.
3. **Data Generation:** Cheap data plans, high smartphone penetration, and a thrust towards providing services via the digital public infrastructure has led to India having the highest data consumption in the world. Thus, data is being generated at an ever-increasing pace.
4. **5G Penetration:** As 5G penetration increases, many internet of things (IoT) related applications that rely on high-speed and AI algorithms will increase. This availability of data makes India an ideal training ground for AI.
5. **Favourable Government Policy:** The government is also focusing on AI-related research and a significant increase in computing capacity.
6. **Hardware and Chip Design:** There is also a focus on building indigenous capacity in electronics hardware and semiconductor fabrication, with India already being a leading hub for chip design.
7. **Collaborations with Academia:** Several academic institutions such as IIT Madras already have testbeds and research labs focused on AI-related areas.

What are the prospects and applications of AI in India?

- 1) **High Future Growth Prospects:** AI could contribute around **10% of India's GDP** by the time the \$5trillion mark is achieved.
- 2) **Investment Opportunities:** Given a vibrant startup ecosystem, private-sector research on AI is expected to lead to an increase in investment opportunities.
- 3) **Application in Sectors:** Experts believe it can transform sectors like agriculture, logistics, energy, healthcare, and financial services.
- 4) **Job Creation:** It is also likely to create jobs requiring sophisticated skills.

What are the challenges?

Threat to Job Creation: AI could replace the need for humans in various functions. Even large Indian IT firms working with labour cost advantages may suffer.

Such unintended consequences will need to be addressed.

Rise of deepfake-Threat to election integrity

News-The article discusses the potential impact of deepfake on upcoming general elections.

A detailed article on **Deepfakes** can be [read here](#).

What is deepfake technology?

Deepfakes are synthetic media that use Artificial Intelligence (AI) to manipulate or generate visual and audio content. They are manipulated usually with the intention of **deceiving or misleading someone**.

A detailed article on **New IT Rules for social media and its Challenges** can be [read here](#).

How does deepfake technology pose a threat to integrity of elections in India?

- 1) **Emergence of generative adversarial networks (GANs)-** This is a variant of generative AI which facilitates the rapid **generation** of deepfakes on a real-time basis. Due to its easy **accessibility**, it may lead to the creation of a large number of deepfake accounts that can **suppress factual information** in every constituency. For ex-deepfake videos of **Indian Prime minister**.
- 2) **Weaponization of social media-** Deepfake videos evoke emotions and exaggerate **confirmation bias** by spreading **more misinformation on** social media platforms.
- 3) **External election interference-** Digital businesses can create context-specific fake videos for politicians and **foreign powers**. These fake videos may be abused by **hostile foreign countries** to threaten the integrity of Indian elections.

What are the issues in regulating deepfakes?

The April 2023 amendment to IT rules empowers the **central government** to instruct social media platforms and intermediaries to remove deepfakes or objectionable content. There are certain

issues:

- A) This provision may be abused by **the ruling party** for targeting political adversaries.
- B) The current IT rules focus on content takedown but do not provide **penal provisions** for creating deepfakes.
- C) The **Bhartiya Nyaya Sanhita** places the burden of proof on the **prosecution** for establishing deep fake related crime.
- D) Most deepfakes are uploaded from **abroad** with masked entities. However, Indian law does not have **extra-territorial jurisdiction** to prosecute entities outside India which endangers India's interest.

What steps can be taken to preserve the sanctity of the electoral process?

- 1) **Continuous monitoring**- The ECI (Election Commission of India) can continuously monitor social media posts which are trending. The ECI may collaborate with IITs to deploy **Fakecatcher technology** which is capable of identifying **tampered videos** in real-time.
- 2) **Empowering the ECI**- There is a need to amend the IT rules to grant the ECI the power to **directly instruct** intermediaries to take down fake videos. This will also ensure political neutrality.
- 3) **Overcoming regulatory hurdles**-
 - a) The IT rules need to be amended to put the burden of proof on fake content creators. There should be **penal provision** for creating deepfakes.
 - b) There should be enactment of some laws which can be **extra-territorial** in nature.
- 4) **Global Cooperation**- This involves collaborating with global platforms to share information regarding **uploads**, assistance in **investigation** and quick **removal** of objectionable content.

Deepfake poses a great challenge to the 2024 general elections. Nonetheless, the ECI must take all the necessary steps to ensure the **sanctity** of electoral process and uphold the **democratic ethos** of India.

Topic: Awareness in the fields of IT, Space, Computers, Robotics, Nano-technology, Bio-technology

Significance of moon landings missions- A new success

News: The article discusses recent moon landings by different countries and organizations. It highlights India's successful Chandrayaan-3 mission, Russia's failed Luna 25 mission, and the U.S.-based Intuitive Machines' first private moon landing. The article emphasizes the role of collaboration and private sector involvement in space exploration.

What recent moon landings have occurred?

India's Chandrayaan-3 successfully soft-landed on the moon, a significant achievement for ISRO. Russia's Luna 25 mission failed, showing challenges for Roscosmos. The U.S. company Intuitive Machines achieved the first private soft landing on the moon.

What is the significance of moon landings missions?

1. **Global Participation:** Recent missions like India's successful Chandrayaan-3 and Russia's Luna 25 indicate a growing global interest in lunar exploration.
2. **Private Sector Milestone:** The U.S.-based Intuitive Machines' successful landing marks a new era of private companies playing a significant role in space exploration, facilitated by NASA's CLPS program.
3. **Technological Advancements:** These missions showcase advancements in space technology, with ISRO's Chandrayaan-3 highlighting India's capabilities and Intuitive Machines overcoming a navigation glitch, demonstrating the importance of innovation and problem-solving in space missions.
4. **Learning from Success and Failure:** Both successful and failed missions provide valuable insights for future space exploration, enhancing understanding and strategies in this field.

How are different countries contributing?

1. **United States:** Through NASA's Commercial Lunar Payload Services (CLPS) program, the U.S. is nurturing private space ventures, exemplified by Intuitive Machines' successful moon landing, highlighting the synergy between government initiatives and private sector innovation.
2. **India:** By successfully launching Chandrayaan-3, India, under ISRO, is demonstrating its growing prowess in space technology, emerging as a significant player in lunar exploration and showcasing advancements made in space research post-colonial era.
3. **Russia:** Despite the setback with Luna 25, Russia, via Roscosmos, continues its long-standing tradition in space exploration, contributing valuable experiences and lessons to the global space community, albeit facing challenges in maintaining its historical reputation in the field.

Private participation in India's space sector

News-The article discusses the significance of increasing private sector participation in space.

What is the need for attracting private sector participation in the space sector?

- 1) **Unleashing the true potential of space economy-** Currently, India's space economy is worth \$8 billion. This is just 2 per cent of the global space economy.
- 2) **Space station-**India intends to launch its own space station by 2035. Thus, it would require funding not only from government sector but private sector also.
- 3) **Strategic Goals-**Space has become one of the dimensions of modern warfare. This requires optimal use of space and private sector participation can help in achieving this objective.
- 4) **Lower the burden on ISRO-**Enhanced private sector participation would allow the Indian Space Research Organization to exclusively focus on research and development.

A detailed article on **Private-sector participation in space** can be [read here](#).

What are the steps taken by the government to enhance private sector participation in the space sector?

- 1) **IN-SPACE:** This was launched to provide a level playing field for private companies to use Indian space infrastructure.
- 2) **New Space India Limited (NSIL):** Its aim is to use research and development carried out by ISRO over the years for commercial purposes through Indian industry partners.
- 3) **Indian Space Association (ISpA):** It aims to open the Indian space industry to private companies and startups. For ex- around 190 startups are working in this area.

What is the significance of enhanced private participation in the space sector?

- 1) **Boost to space economy-** It will increase India's share in the global space economy.
- 2) **Innovative Solutions-**It can provide innovative solutions in areas such as telecommunication, agriculture, climate change, and disaster management.
- 3) **Employment Generation-**Increased private-sector participation in the country's space sector can provide employment to youths.
- 4) **Growth of industrial sector-**It will lead to development of industrial clusters. For ex- Salem aerospace cluster in Tamil Nadu and the Belagavi aerospace cluster in Karnataka.

What is the recent decision to improve private sector participation in space?

On February 21, the government took the decision to allow:

1. **100% FDI** in the "manufacturing of components and systems/sub-systems for satellites, ground segment and user segment".
2. Up to **74% FDI** in satellite-manufacturing, operations, and data products.
3. Up to **49% FDI** in launch vehicles, space ports, and their corresponding systems.

What will be the implications of this decision?

1. **Raise Private Sector Participation:** This will increase the contributions of private space flight operators, technology-developers, and application designers to the national space economy, in line with the Space Policy.
2. **Ability to Compete with China:** The decision gives India the ability to take advantage of China's strained foreign ties to catch up with China's more advanced position as a space power.
3. **Investment in Indian Startups:** Nw investments can add to India's space economy by improving start-ups' access to talent and capital, boosting local manufacturing, and improving investor confidence.

What should be the way forward?

The government must do the following:

- a) Keep the regulatory environment clear.
- b) Reduce red tape.
- c) Increase public support.
- d) Make it easy for Indian companies to access foreign markets.

GAGANYAAN- Indian Human Spaceflight Programme.

News-The article discusses about India's most ambitious space programme Gaganyaan.

Background: Prime Minister has recently announced the names of the four astronauts who are undergoing training for the country's maiden human space flight mission, Gaganyaan.

What is Gaganyaan Mission?

It is a space mission to demonstrate ISRO's human spaceflight capability by launching a human crew to an orbit of **400 km** and bringing them safely back to earth.

What is its goal?

The **short-term goal** is to demonstrate human spaceflight to Low Earth Orbit. The **long-term goal** is to lay the foundation for a sustained Indian human space exploration programme. Further, India also intends to demonstrate the fact to the world that it is capable of indigenously developing this complex technology.

Read more: [Private participation in India's Space Sector.](#)

What is the significance of Gaganyaan Mission?

- 1) **Scientific temper-** The mission will help in inculcating scientific temper and creativity that will inspire the next generation of students.
- 2) **Manned Missions-**It will help in developing the critical technology for carrying out scientific human space exploration in future.
- 3) **Enhanced private participation-**The success of the mission will encourage the private sector to invest in space technologies. Recently, the government has allowed 100 % FDI in space sector.
- 4) **Foster International Collaboration-** India's technological demonstration will encourage collaboration with like-minded countries for future international space collaboration.

Genome India Project

News-The article highlights the significance of genome sequencing.

Background- The government's Genome India initiative has recently announced successful sequencing of 10,000 whole genomes of healthy persons from across the country, creating a genetic map of the population.

What is Genome sequencing?

Genome sequencing is figuring out the order of DNA nucleotides, or bases, in a genome—the order of Adenine, Cytosine, Guanines, and Thymine that make up an organism's DNA. The human genome is made up of **23 chromosomes pairs** with a total of about 3 billion DNA base pairs.

How is it sequenced?

- 1) Researchers first extract the information from the blood to sequence the genome.
- 2) Scientists cut 3 billion pairs into small pieces and tag because a complete sequence of 3 billion pairs would be extremely hard to handle.
- 3) The A, C, G, T code of these smaller chunks are written down by a DNA sequencer and then the complete sequence is put together.

Read more: [Genome Sequencing in context of Coronavirus epidemic.](#)

What is Genome India Project (GIP)?

- 1) **Description**-It is a scientific initiative inspired by the Human Genome Project (HGP), an international effort that successfully decoded the entire human genome between 1990 and 2003.
- 2) **Objective**-It was started in 2020 to better understand the genetic variations and disease-causing mutations specific to the Indian population, which is one of the most genetically diverse in the world.
- 3) **Partners**-It involves the collaboration of 20 institutions across India and is being led by the Centre for Brain Research at IISc in Bangalore.
- 4) **Findings**-Researchers have analyzed 5,750 of the genome sequences and have already identified 135 million genetic variants found in India.

What is the significance of Genome India Project (GIP)?

- 1) **Understanding genetic history**-A map of genetic diversity is essential for understanding the history of our evolution, discovering the genetic basis for various diseases, and creating therapies of the future.
- 2) **Identification of distinct genetic makeup**-India with population of 1.4 billion has more than 4,600 distinct groups. Endogamy (marrying within the same community) is quite common in India so various groups have been able to maintain their distinct genetic makeup. This can help in understanding the impact of genetic variations on physical health.
- 3) **Precision Healthcare**-It can help in targeted treatments, especially for rare diseases that usually arise from genetic anomalies. It can help develop new therapies that can cure these diseases. For ex- the under-development mRNA vaccine which will be used to prevent relapse of pancreatic cancer.
- 4) **Identification of resistance-indicating variants**-It can help in identifying resistance-indicating variants. These variants genes might make certain medicines or anesthetics ineffective in certain populations. For example- Vaishya community from South India lack the gene for properly processing common anesthetics.

Topic: Indigenization of technology and developing new technology

Sustainable funding for science

News-The article highlights the need to ensure sustainable funding for science to achieve developed country status by 2047.

What is the state of science funding in India?

India's research and development (R&D) expenditure is around **0.64% of GDP**. There has been a decline in science funding from 0.8% in 2008-2009 and 0.7% in 2017-2018 to 0.64 currently. This is despite the fact that both 2013 Science, Technology, and Innovation Policy and Economic survey have urged the government to take R&D spending to 2% GDP. A detailed article on **Funding Issues of Indian Science** can be [read here](#). With respect to other countries, funding for fundamental research in India is amongst the world's lowest. In 2021, member-countries of the **OECD** on average spent **2.7% of their GDP** on R&D. The U.S. and the U.K. have consistently spent more than 2% of their GDPs on R&D for the past decade.

What are the issues with science funding in India?

- 1) **Lack of private sector participation-** In 2020-2021, the private sector industry contributed **36.4% of the GERD** whereas in economically developed countries, a major share – 70% on average – of R&D investment comes from the private sector.
- 2) **Regulatory Issues-** Issues like lack of clear exit options for investors in sectors such as biotechnology and fears of intellectual property rights theft discourage private investment in R&D in India.
- 3) **Under-utilization of allotted funds-** In 2022-2023, the Department of Biotechnology (DBT) used 72% of its estimated budget allocation while the Department of Science and Technology (DST) used only 61%.
- 4) **Lack of capacity-** There is lack of capacity to evaluate projects or clear utilization certificates and release grant and salary disbursements on time.

What should be the way forward?

- 1) **Enhanced private sector participation-** Finance Minister highlighted the need for enhanced R&D expenditure from the private sector.
- 2) **Budget optimization-** There should be a reduction in the under-spending and underutilization of funds earmarked for R&D.
- 3) **Political prioritization-** R&D spending should be given utmost importance by political class. This prioritization must happen within the ministries concerned and at the Ministry of Finance, which disburses the funds.
- 4) **Overcoming regulatory hurdle-** There should be incentives for private investment, including relaxation of foreign direct investments, tax rebates, and clear regulatory guidelines for private players.
- 5) **Evaluation & monitoring-** There should be capacity building of bureaucrats so that they can evaluate science projects and, after allocations, monitor utilization.

India should spend at least 3% of the GDP on R&D annually until 2047 reach the 'developed nation' status.

Issues with science in India - The wrong cooks spoiling the scientific broth

News: The article discusses the need for Indian science to focus more on real-life problems and interdisciplinary approaches, involving humanities and social sciences, rather than just traditional scientific methods. It emphasizes collaboration, multidisciplinary thinking, and engagement with broader society to solve complex issues.

How is science perceived in India?

Science in India is widely regarded as a means to develop intelligence and unbiased citizenship. The prevailing belief is that a science-focused education fosters objectivity and scientific thinking in students. However, there is criticism that many Indian scientists lack a fully developed scientific temper, often prioritizing power over genuine knowledge.

What are the issues with science in India?

1. **Partial Scientific Temperament:** Scientists in India are often more focused on power than on fully developing their scientific understanding.
2. **Reliance on Western Publications:** There's a strong preference for knowledge from western journals, while local Indian research is undervalued.
3. **Global Appeal Over Local Relevance:** Indian research tends to prioritize topics with international interest, like hypothetical global phenomena, rather than local issues such as pollution in Bengaluru's Bellandur Lake.
4. **Lack of Holistic Approaches:** The article notes a deficiency in interdisciplinary methods, with a need for integrating sciences with humanities and social sciences to tackle complex societal problems.

What should be done?

1. **Redeploy Scientific Efforts:** Redirect a significant portion of scientific resources to the science-society interface to solve real-life problems, rather than solely pursuing academically driven or globally appealing research.
2. **Integrate Humanities and Social Sciences:** Encourage the integration of natural sciences with human sciences, such as psychology, sociology, and philosophy, to better understand and address the societal impact of scientific work.
3. **Foster Multidirectional Knowledge Flow:** Create institutional linkages that encourage knowledge exchange between scientists and external communities, breaking down barriers between different disciplines and the public.

Subject: Environment

Topic: Conservation, environmental pollution and degradation

Green elections - Stop the dithering and encourage green elections in India

News: The article discusses the need for environmentally friendly elections in India. It highlights the harmful environmental impact of traditional elections.

What is the carbon footprint of an election?

1. **Significant Emissions from Campaign Flights:** In the 2016 US presidential election, the carbon footprint from the campaign flights of just one candidate was equivalent to the annual emissions of 500 Americans.
2. **Primary Sources of Emissions:** According to a study, the main sources of carbon emissions during elections are transportation for voters and logistics to and from polling booths.
3. **Impact of Traditional Election Practices:** The use of non-biodegradable materials like PVC banners, loudspeakers, and disposable items in traditional election methods contributes substantially to the carbon footprint.
4. **Effects of Large Scale Elections:** In populous countries like India, the sheer scale of elections, involving crores of voters and mass rallies, significantly amplifies the environmental impact.

What are the challenges of conducting green elections?

1. **Technological Challenges:** Implementing digital voting systems requires robust infrastructure, and needs changes in behavior, especially in rural areas, and safeguards against hacking and fraud.
2. **Financial Constraints:** There are high upfront costs for eco-friendly materials and technology, which can be a barrier for financially constrained governments.
3. **Access and Training:** Ensuring that all voters have equal access to new technologies and adequately training election officials are significant hurdles.

What successful green election initiatives exist?

India

Kerala's Initiative: During the 2019 general election, the Kerala State Election Commission encouraged political parties to avoid single-use plastics. The Kerala High Court also banned flex and non-biodegradable materials in electioneering.

Eco-Friendly Booths in Goa: In the 2022 Assembly elections, the Goa State Biodiversity Board created election booths using biodegradable materials crafted by local artisans.

Global

Sri Lanka's Carbon-Sensitive Campaign: In 2019, Sri Lanka's SLPP party conducted the world's first carbon-sensitive environmentally friendly election campaign. They measured and compensated for

carbon emissions from vehicles and electricity in political campaigns by planting trees. **Estonia's Digital Voting:** Estonia introduced digital voting, reducing the carbon emissions related to transportation to polling stations. This method also improved voter participation while being eco-friendly.

What should be done?

1. **Legislation for Eco-Friendly Practices:** Enact laws mandating environmentally friendly electoral practices, integrating them into the Model Code of Conduct.
2. **Digital and Door-to-Door Campaigning:** Shift to digital platforms for campaigning to reduce energy-intensive public rallies and encourage public transportation for election work.
3. **Use of Sustainable Materials:** Replace plastic and paper-based materials with sustainable alternatives like natural fabrics and recycled paper in polling booths.
4. **Digital Voting Implementation:** Adopt digital voting systems with robust security measures, as demonstrated successfully by Estonia.
5. **Education and Equitable Access:** Ensure all voters have access to digital technologies and provide necessary education and support.
6. **Collaboration Among Stakeholders:** Involve political parties, Election Commissions, governments, voters, media, and civil society in promoting and implementing green election initiatives.

Forest (Conservation) Amendment Act 2023 controversy- Red signal for green dilution

News: The article discusses a recent Supreme Court decision in India. The court ruled that the government must use a broad definition of forests from a 1996 judgment. This affects how the Forest Conservation Act is applied and protects more forest areas.

What was the Supreme Court decision on forests?

The Supreme Court of India reverted to the broader definition of forests from a 1996 judgment. This decision affects the application of the Forest Conservation Act (FCA). The 2023 amendments to the FCA had limited its application to notified or recorded forests only. The Court's decision protects more forest areas from being excluded under the FCA.

For more information on Forest (Conservation) Amendment Act 2023 [read here](#)

Why were the amendments to the FCA controversial?

1. **Impacts on Forest Area:** The 2023 amendments to the Forest Conservation Act (FCA) made it applicable only to notified or recorded forests. This narrowed the definition of forests, potentially leading to the declassification of millions of hectares.
2. **Impact on Non-Forest Use:** The amendments facilitated infrastructure development, like roads and highways, in forest areas. They enabled non-forest uses of land that were previously protected, weakening environmental safeguards.
3. **Environmental Concern:** Critics argued the amendments posed significant environmental risks. The amendments raised fears about increased degradation and loss of biodiversity in

forest areas not covered by the FCA. For example, Haryana's plan for an animal safari park in the Aravalli forests, a pristine forest area, was a direct result of these amendments.

What is the government's justification for this?

The government justified the 2023 amendments to the Forest Conservation Act (FCA) citing development and infrastructure needs.

It argued that the original FCA hindered the construction of essential facilities like schools and infrastructure for tribal communities.

The government claimed that these amendments were necessary to balance environmental protection with development requirements.

As an example, the amendments aimed to facilitate road and highway construction, which was difficult under the strict provisions of the original FCA.

However, the Forest Rights Act already allowed for forest land diversion for such projects, making the amendment somewhat redundant.

Significance of recognizing the pattern of global warming

News: According to the author, no one has been able to fully explain the patterns of warming associated with the earth's surface, when the temperature exceeds 1.5 degrees C warming threshold.

What is the 1.5 degrees C warming threshold?

This was included in the **Paris Agreement** after intense negotiations by member-countries of the U.N. Framework Convention on Climate Change (UNFCCC). However, 1.5 degrees C is not a **scientific threshold**.

This number was based on understanding of European politicians who felt in 1990s that they can achieve a target of limiting the temperature below 2 degrees C.

What are the different methods used to measure temperature change?

At present, there are various methods to measure the temperature change. The new study published in **nature** has discussed so called "**palaeo proxies**" method.

This method uses chemical evidence stored in various **organic matter**, such as **corals**, **stalactites**, and **stalagmites**, to approximate the temperature at some point in the past.

In this method, researchers carefully calibrate the **various chemical compounds** assimilated by some species into their biogenic materials – such as calcium carbonate. This helps in establishing the **relationships between those chemicals and the prevailing local temperature**.

What is the limitation of this method?

- 1) Present methods are limited in the sense that they **extrapolate** the data from a single location and use historical evidence to draw **global conclusions**.
- 2) Based on this method, they calculate **global temperature averages** without considering **spatial variations**. For example, there has been no studies to explain some **unusual patterns** like impacts of

El-Nino on the amount and the distribution of the **2023 unusual Indian monsoons**.

3) There is only indirect **evidence of temperature changes** with respect to a baseline temperature. This evidence can't measure the **actual overall temperatures**.

What should be done?

There is a critical need to understand the specific patterns of warming on a global scale, instead of focusing on breaching threshold, because-

- 1) Recognizing warming patterns is important to **manage the disasters** associated with global warming.
- 2) The local warmings and cooling's and their magnitudes determine the net effect of global warming in a particular locality hence they **cannot be generalized**.
- 3) We need to recognize patterns to **adapt** to the changing seasons and to minimize impact on **lives, livelihoods, and economies**.

Conclusion

It is important to keep the **global warming patterns in mind** rather than focusing a lot on **arbitrary threshold number** that do not have a scientific basis.

Phasing out fossil fuels equitably - Equity concerns in banning fossil fuel extraction

News: The article discusses the challenges and debates surrounding the reduction of fossil fuel use to combat climate change. It highlights the different capacities and needs of various countries in transitioning away from fossil fuels, considering economic and legal aspects.

What is the current state of climate change litigation and fossil fuel policies?

1. **Inadequate Response to Climate Change:** Governments and corporations have not effectively tackled climate change, leading to increased climate change litigation worldwide.
2. Momentum is also growing in favor of a **Fossil Fuel Non-Proliferation Treaty**. For more information on Fossil Fuel Non-Proliferation Treaty [Read This Article](#)
3. **Coal Elimination Proposal:** An academic proposal recommends ending coal mining and burning by 2030. This aligns with the Production Gap Report, highlighting a discrepancy between current fossil fuel production plans (produce 110% more fossil fuels by 2030) and the Paris Agreement's goal to limit warming to 1.5° Celsius.
4. **Recent Climate Conferences' Stance:** COP26 in Glasgow (2021) and COP28 in Dubai (2023) focused on reducing coal use and transitioning to net-zero emissions by 2050.

What are the challenges in phasing out fossil fuels equitably?

1. **Economic Dependence on Fossil Fuels:** Countries like Azerbaijan, Congo, Iraq, Nigeria, Oman, and Timor Leste heavily rely on fossil fuel revenues, making it challenging to phase out without impacting their economies.

2. **Diversification of Economy:** Wealthier nations such as Canada, the USA, and the UK have more diversified economies and higher per capita incomes, facilitating easier transition from fossil fuels.
3. **Employment Concerns:** In countries with a significant number of jobs tied to the fossil fuel sector, like India, phasing out fossil fuels could lead to major employment challenges.
4. **Aligning with Climate Change Principles:** The challenge lies in integrating the Fossil Fuel Non-Proliferation Treaty with the principles of Common but Differentiated Responsibilities and Respective Capabilities (CBDR-RC) and Nationally Determined Contributions (NDC) of the climate change regime. This involves balancing global objectives with individual countries' unique circumstances and capacities.

What does International Law say about fossil fuel use?

1. **Rights to Natural Resources:** International law allows states to use their natural resources for economic development.
2. **Obligation to Prevent Harm:** There's a caveat that states must not cause significant harm to other states, especially in the context of trans-boundary natural resources.
3. **Environmental Impact Assessments (EIA):** The International Court of Justice (ICJ) in the Pulp Mills Case (2010) declared conducting trans-boundary EIAs as part of customary international law.
4. **Global Commons Uncertainty:** The application of these laws to global issues like fossil fuel extraction and its impact on global warming is less clear.
5. **Human Rights Considerations:** Western scholars argue for the need to conduct EIAs for fossil fuel extraction's impact on global warming and its human rights consequences on local and indigenous populations.

What is India's situation in the fossil fuel transition?

1. **Heavy Reliance on Fossil Fuels:** India predominantly depends on fossil fuels for energy, with a significant part of its power sector rooted in coal.
2. **Employment Impact:** Nearly 3.6 million people across 159 districts are employed directly or indirectly in the coal mining and power sector.
3. **COP26 Stance:** India advocated for "phasing down" rather than "phasing out" coal, indicating a preference for a gradual transition.
4. **Subsidy Scrutiny:** India's subsidies on kerosene oil have been criticized for inconsistency with the Paris Agreement, highlighting the complexities in balancing economic needs with environmental commitments.

Subject: Internal Security

Topic: Security challenges and their management in border areas

The crime of piracy, and how maritime forces respond to it

News: The article discusses the causes, solutions and challenges of dealing with ocean piracy.

Background:

Recently, the Indian Navy prevented 2 piracy attempts off the Somali coast, including the rescue of 19 Pakistanis.

In recent years, the west coast of Africa, Gulf of Aden, Horn of Africa, Bangladesh, and the Strait of Malacca have seen piracy attacks.

Why are these areas particularly affected?

- 1) **Poorly policed:** The coastal countries have weak maritime forces, or none.
- 2) **Concentration of shipping traffic:** They are either choke points in shipping routes where ships are forced to converge or slow down by geography, or anchorages where ships remain stationary for days before entering port.
- 3) **Poor governance or turmoil:** This leads to unemployment, poverty and consequently, crime.
- 4) **International waters:** This makes them fall within the maritime jurisdiction of several countries. This leads to legal complexities and difficulties in coordination.

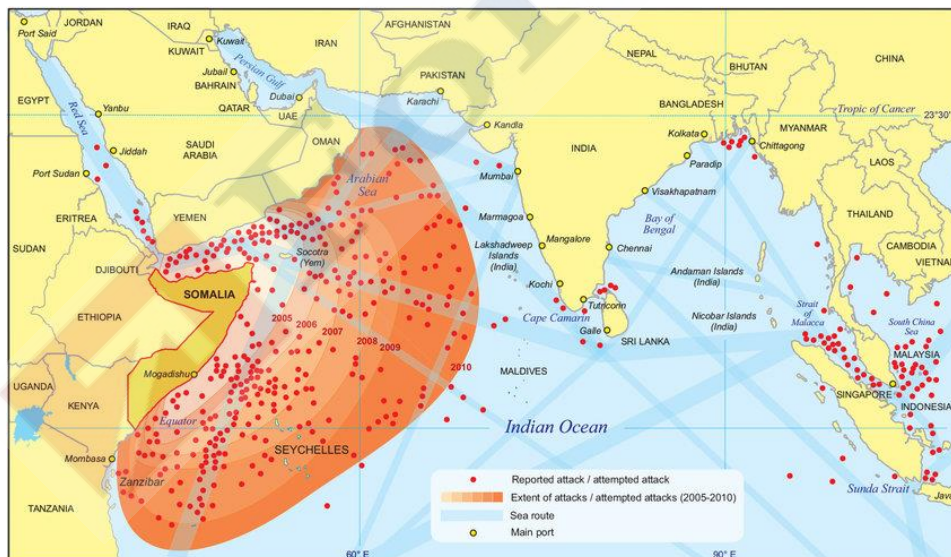


Figure 1. Somali Piracy Threat. Source: ResearchGate.

What are the consequences of piracy?

- a. Causes panic in maritime business and leads to the establishment of high-risk areas.
- b. Increase in maritime insurance premiums.
- c. Affects the safety of ships and seafarers.
- d. Disrupts global supply chains.

How can the crime of piracy be tackled?

1. **Long-Term:** A long-term solution lies in rooting out misgovernance and unemployment in nations ashore, which feed maritime criminal activities.
2. **Short-Term:** The situation at sea has to be contained and stabilised by the world's maritime forces.

What role has the Indian Navy played in tackling the problem?

Indian Navy's anti-piracy patrol started in 2008. It has foiled several attempts by pirates at hijacking merchant ships. The boundaries of the high-risk area that covered much of the Arabian Sea during the height of Somali piracy (2009-12) were pushed back westward primarily due to the efforts of the Indian Navy. The Indian Navy has been practising **Maritime Intervention Operations (MIO)** for decades, and has developed extremely high expertise in this niche area of naval operations.

How do maritime forces execute anti-piracy operations?

1. First, they maintain a visible presence that aims to deter pirates from carrying out attacks.
2. Their ships and aircraft undertake surveillance of the high-risk area, identify suspect vessels, and report them for further investigation. This is supported by information fusion centres.
3. They warn passing ships about suspect vessels and announce escort schedules (so that ships can join convoys).
4. They proactively or reactively intervene to manage a developing situation, foil a piracy attempt, or rescue a hijacked vessel while trying to ensure minimum casualties and damage.

What are the challenges with handling captive pirates?

- 1) **Inadequate National Laws:** They are often inadequate to deal with apprehended pirates.
- 2) **Lack of effective international legal mechanism** for their trial and disposal.
- 3) **Jurisdictional Issues:** The many nationalities, countries, maritime zones, flag states, etc. involved raise complex jurisdictional issues.

Topic: Challenges to Internal Security through Communication Networks, Role of Media and Social Networking Sites in Internal Security Challenges

Threats posed by Artificial intelligence

News-The article discusses the threats posed by artificial intelligence to nations territorial sovereignty and highlights the need for a robust global AI governance body.

What is Artificial Intelligence?

AI refers to the ability of machines to perform cognitive tasks like thinking, perceiving, learning, problem solving and decision making.

It includes technologies like machine learning, Deep Learning, Big Data, Neural Networks,

Computer vision, Large Language Models etc.

A detailed article on the **Significance and Challenges of Artificial Intelligence (AI)** can be [read here](#).

What are the threats posed by Artificial Intelligence?

1) Reshaping traditional notions of sovereignty:

- a) It is challenging the power dynamics between states, private technology companies, and individuals. As AI systems become more autonomous, they are creating new digital spaces that are not governed by traditional laws or state control.
- b) It has started a new era of digital sovereignty which is altering the concept of territorial sovereignty. Here, countries that lack in development of AI will become more dependent on advanced nations by compromising their sovereignty in strategic sectors.

2) Undermining Democracy:

- a) It can be used to manipulate information and influence public opinion. For example, AI can generate disinformation and misinformation at scale, which can trigger tensions and electoral-related conflict and violence.
- b) It can be abused by hostile foreign powers to promote campaigns that can deepen divisions within societies, distort objective information and weaken democratic systems.

3) Lethal Autonomous Weapons Systems (LAWS):

- a) **Technical challenge-** It is equipped with advanced AI algorithms which can independently identify and engage targets without human intervention. It can enhance military conflicts because it may lead to indiscriminate or erroneous targeting of civilians without human intervention.
- b) **Ethical challenge-** It undermines fundamental principles of humanitarian law and responsibility. The absence of human oversight in the decision-making process of life and death raises moral questions about accountability.
- c) **Arms race-** The proliferation of LAWS could lead to an arms race. This can destabilize international peace and security.

4) Threat to cybersecurity:

AI-enhanced methods, such as advanced persistent threats and spear phishing, can penetrate and disrupt critical national infrastructures. This can weaken nations cybersecurity.

Considering these challenges, there is a need for a robust global AI governance body which must ensure that advancement in AI can be used for serving humanity.