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# Current Affairs (CONSOLIDATION)

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# Polity and Governance

## Highlights

- Covid-19 Performance Index
- KIIFB Borrowings Issue
- Supreme Court Dismissed Aadhaar Review Petitions
- Supreme Court Directive on Quota in Promotions
- Modified Scheme to Produce 1G Ethanol
- Collegium System for the Appointment of Judges
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- ShramShakti Portal
- 35<sup>th</sup> Pragati Meeting
- Kala Utsav 2020

## Covid-19 Performance Index

### Why in News

India has been ranked 86<sup>th</sup> in a "Covid-19 Performance Index" comprising 98 countries.

### Key Points

#### ➤ About the Index

- **Institution Involved:**
- **Covid-19 Performance Index** was compiled by the **Sydney-based Lowy Institute**, an Australian think tank, which sought to **measure the response of countries to the Pandemic.**
  - The Institute **also took into account** the impact of geography, political systems and economic development in assessing outcomes.
- **Parameter Used:**
  - **Six Indicators:** Confirmed cases, confirmed deaths, cases per million people, deaths per million people, cases as a proportion of tests, and tests per thousand people.
  - **Fewer reported cases and deaths**, both in aggregate and per capita terms, point towards a **better response to the virus.**

- **More tests** conducted on a per capita basis reveal an accurate picture of the **extent of the pandemic at the national level.**

- **Lower rates of positive tests** indicate **greater degrees of control** over the **transmission of Covid-19.**

#### ○ **Assessing Method:**

- Assessed **98 countries in the 36 weeks** that followed their hundredth case.
  - **China was not included in the study** because all of its testing rates are not publicly available.
- An average across six indicators was calculated for individual countries in each period and normalised to produce a **score from 0 (worst performing) to 100 (best performing).**

#### ➤ **Results:**

##### ○ **Top Countries:**

- **New Zealand topped the rankings** closely followed by Vietnam, Taiwan, Thailand and Cyprus.

##### ○ **Bottom Countries:**

- **Brazil stood at the bottom** of the index. The **USA was the fifth-worst performing country**, it stood at 94 out of 98 countries.

##### ○ **South Asian Countries:**

Note:



- **Sri Lanka was the best performing nation in South Asia**, ranking 10, while the Maldives was at 25, Pakistan at 69, Nepal at 70, and Bangladesh at 84.
- **Performance of India:**
  - **India ranked 86<sup>th</sup>** in the Covid-19 Performance Index out of 98 countries.
  - At **24.3**, India's average was **lower than the region it belongs to — Asia-Pacific** — which scored 58.2 and ranked best in the region-wise evaluation.
- **Trend Analysis:**
  - **Smaller countries performed better:** In general, **countries with smaller populations, cohesive societies, and capable institutions** have a comparative advantage in dealing with a global crisis such as a pandemic.
    - **Smaller countries with fewer than 10 million people** consistently outperformed their larger counterparts throughout 2020.
  - **Leadership Mattered:** Levels of economic development and differences in political systems didn't have as much of an impact on coronavirus response as expected.
    - **Proper management of the pandemic was not much dependent on the regime type** but whether citizens trust their leaders, and whether those leaders preside over a competent and effective state.
  - The relatively '**low-tech**' nature of the health measures used to mitigate the spread of the virus created a more level playing field between developed and developing countries.
    - The **deployment of vaccines, however, could give richer countries an advantage.**

## KIIFB Borrowings Issue

### **Why in News**

Recently, the **Comptroller and Auditor General (CAG)** of India has opined that the **off-budget borrowings** made by the **Kerala Infrastructure Investment Fund Board (KIIFB)** for critical infra projects have **bypassed the limits set on government borrowings under Article 293 (1) of the Constitution** and such borrowings do not have legislative approval.

- **Off-budget borrowings** are a means by which the government keeps its fiscal deficit in check by making quasi-government entities borrow on its behalf, to partly fund its expenditure plan for the year.

### **Provisions of Borrowings under Constitution**

- **Borrowing by Centre and the States:** Chapter II in Part XII of the Constitution of India deals with borrowing. Article 292 covers borrowing by the Central Government, and Article 293 covers borrowing by States.
- **Empowering State Legislatures:** Article 293(1) provides State legislatures the power by law to enable or limit the State's executive powers of borrowing and giving guarantees.
- **Consent of the Centre:** Under clauses (3) and (4) of Article 293, State Governments need to obtain the consent of the Centre for raising fresh loans in case they are indebted to the latter, and such consent may be granted subject to conditions.

### **Key Points**

- **Issues:**
  - **Bypassed Constitutional Limit:** CAG reported that KIIFB has bypassed the limits set on government borrowings under Article 293 of the Constitution as these borrowings did not have legislative approval.
  - **Encroachment on Powers of Centre:** The CAG said that **Entry 37 of the List 1 of the Seventh schedule of the Constitution** gives powers of raising foreign loans only to the Centre. Thus, KIIFB borrowings are in violation of the Constitution and encroachment on the powers of the Centre.
  - **Lack of Transparency:** KIIFB borrowings have not been disclosed in the Budget documents or in the accounts.
    - It raises doubts on transparency, and of inter-generational equity of the borrowings, the State has to furnish to Centre all the financial statements showing the estimates of receipts and payments of all sources of borrowings, including Open Market borrowings.
  - **Burdened State Finances:** KIIFB raised funds by issuance of bonds which were to be repaid from the petroleum cess and motor vehicle tax.
    - CAG reported that since the KIIFB has no source of income, the borrowings by the KIIFB for which the State stood as guarantor, may ultimately turn out to be a **direct liability of the State government.**

Note:

- **Risk of Mounting External Liabilities:** The RBI was criticised for granting approval to the state to float **masala bonds**. The CAG raised concerns that if this mode was followed by other States, the **external liabilities of the country** would rise substantially without the Centre's knowledge of such liabilities.

#### Kerala Infrastructure Investment Fund Board (KIIFB)

- **Establishment:** KIIFB came into existence in 1999 through the **Kerala Infrastructure Investment Fund Act**.
- **Aim:** To provide investment for critical and large infrastructure projects in the State of Kerala.
- **Features:**
  - KIIFB was the **first sub-sovereign entity** in India to tap the offshore rupee international bond market.
  - In 2019, KIIFB issued its **masala bond** of ₹ 2,150 crore on the **London Stock Exchange**. **Masala Bonds** are **rupee-denominated bonds** i.e. the funds would be raised from overseas market in Indian rupees.
  - **Attracted investments:** The bond issue helped Kerala government to get multinational corporations to invest in the state, which has traditionally been known for its unfriendly business policies, bureaucratic delays and recurrent industrial strikes.
- **Change in Role:** In 2016, the role of KIIFB was changed from **handler of investment bonds to an entity to mobilize the resources** for developmental projects over and beyond the budget.
- **Kerala Government's Concerns:**
  - **Detrimental to State development:** According to the government of Kerala, funds from KIIFB are being used to build public infrastructures such as schools, roads, hospitals etc. and such a move by CAG could hurt the interests of the State.
  - **Unilateralism:** Kerala government raised concerns over not giving the State an opportunity to offer its comments, observations or explanation before publishing of the report by the CAG.
  - **Already RBI Approved:** The Kerala government also highlighted the fact that the KIIFB Bonds were raised with the approval of RBI- which is a central body under Government of India, then how such borrowings can be unconstitutional.

#### ● Role of RBI:

- The **RBI** is authorised to act as **an agent of the Central and State Governments** for the issue and management of the latter's bonds and debentures.
- The **Internal Debt Management Department** of the RBI has the power to float State Government loans, facilitating investment of surplus cash balances of State Governments in dated securities under various funds.
- It is also authorised to make **Ways and Means Advances (WMAs)** to the Centre and States, and to fix the limits thereof.
- **Undermines Federalism:** For decentralisation of financial autonomy, it is necessary to provide a mechanism for regulation of state subnational debt.
  - It could promote macroeconomic fiscal stability of the states. Hence, exercise of power conferred to the centre by the article 293 should be strictly confined to the purposes and circumstances.

#### Suggestions

- **Review of sub-national Fiscal Policy:** Since the state debt burdens have been rising because of recent fiscal shocks such as **demonetisation**, introduction of **GST** and **Covid19 crisis**, sub-national fiscal policy of India needs to be reviewed to enable states for subnational borrowings. It shall provide them more opportunities to avail fiscal autonomy .
- **Validating State Fiscal Responsibility Laws:** Even the Kerala High Court in **Matthew vs Union of India** ruled that that Article 293 is an enabling provision authorising State borrowing and it empowers the states to pass their own **Fiscal Responsibility Laws (FRLs)**.
- **Cooperative Federalism:** There is a need to address the legislative concerns of KIIFB raised by CAG, and the Centre and Kerala government should take out remedial measures in public interest.

## Supreme Court Dismissed Aadhaar Review Petitions

#### Why in News

Recently, the **Supreme Court (SC)** has **dismissed petitions seeking a review** of its **2018 judgment** upholding the constitutional validity of the **Aadhaar Act (2016)**.

Note:

## Key Points

### ➤ Background:

- In 2018, the SC upheld the country's biometric identity system and also cleared mandatory Aadhaar enrolment of recipients of government welfare benefits.
- The court, in its verdict, had also **approved the passage of Aadhaar law by the Parliament as a money bill**, which **did not require an approval of the Rajya Sabha**.
- Thereafter, **review petitions** were filed against the judgement.

### ➤ Issue Involved:

- Whether the **decision of the Lok Sabha Speaker under Article 110 (3)** of the Constitution to certify a bill as a money bill under **Article 110 (1)** is final and binding, or **can be subject to judicial review**.
- If the decision is subject to judicial review, whether the **Aadhaar Act, 2016** has been correctly **certified as a money bill**.

### ➤ SC's Ruling:

#### ○ Majority Decision:

- Majority of the bench (i.e 4 out of 5) held that **"no case for review"** of the 2018 judgment was made and **dismissed the petitions**.
- The 2019 judgment ***in Rojer Mathew v South Indian Bank Ltd*** was not sufficient to press for a reconsideration of the 2018 Aadhaar judgment.
  - **Rojer Mathew v South Indian Bank Ltd 2019:**
    1. The judgment in this case said that the **speaker's decision was not beyond judicial review** though the scope was extremely restricted.
    2. It had also said that the 2018 Aadhaar verdict had not answered conclusively **the question as to what constitutes a money Bill** under Article 110 (1) and had **directed that it be referred to a larger Bench which has not been constituted yet**.

#### ○ Dissenting Judgment:

- One of the five judges dissented with the majority view and said that **the 2019 judgment questioning the correctness of the Aadhaar verdict was a relevant fact and that the apex court must wait for the larger bench of seven judges to decide these pertinent issues**.

- He also referred to the **Sabarimala case** where a nine-judge Bench in February 2020 had **referred certain questions of law arising in the context of an earlier decision** by a five-judge Bench in September 2019 **to a larger Bench while keeping the review petitions pending**.

- He held that it is a constitutional error to hold **at this stage that no ground exists to review the judgment** and it would **have serious consequences not just for judicial discipline, but also for the ends of justice**.

#### ○ Final Judgement:

- Even as one of the five judges on the bench termed it a "constitutional error," the SC by a **majority verdict has dismissed a clutch of petitions seeking a review of its 2018 judgment that validated the Aadhaar Act**.

## Money Bill

- **Article 110** of the Constitution deals with the Money Bills. It states that a bill is deemed to be a money bill if it contains 'only' provisions dealing with all or any of the following matters:

- The imposition, abolition, remission, alteration or regulation of any tax.
- The **regulation of the borrowing of money by the Union government**.
- The **custody of the Consolidated Fund of India or the contingency fund of India**,
  - The **payment of money into or the withdrawal of money from any such fund**.
- The **appropriation of money out of the Consolidated Fund of India**.
- **Declaration of any expenditure charged on the Consolidated Fund of India** or increasing the amount of any such expenditure.
- The **receipt of money on account of the Consolidated Fund of India** or the public account of India or **the custody or issue of such money**, or the audit of the accounts of the Union or of a state.
- Any **matter incidental to any of the matters specified above**.

- **Difference between Money and Financial Bills:**

Note:



Money Bills	Financial Bills	
	Financial Bill-I	Financial Bill-II
Article 110 deals with money bills.	Article 117 (1) deals with Finance Bill - I	Article 117 (3) deals with Finance Bills-II
They deal with <b>'only'</b> provisions mentioned in <b>Article 110</b> .	They contain not only any or all the matters mentioned in <b>Article 110</b> , but also <b>other matters</b> of general legislation.	They contain provisions involving expenditure from Consolidated Fund of India, but not included in Article 110.
<b>Speaker decides</b> whether a bill is a money bill or not.	Does not require certification of the speaker.	Does not require certification of the speaker.
They can be introduced only in Lok Sabha.	They can be introduced only in Lok Sabha.	They can be introduced in both houses.
<b>President's recommendation is needed</b> to introduce them.	President's recommendation is <b>needed</b> to introduce them.	President's recommendation <b>not</b> needed.
It cannot be amended or rejected by the Rajya Sabha.	It can be amended or rejected by the Rajya Sabha.	It can be amended or rejected by the Rajya Sabha.
President can either accept or reject a money bill but <b>cannot return it for reconsideration</b> .	President <b>can return</b> it for reconsideration.	President <b>can return</b> it for reconsideration.
<b>No provision for joint sitting</b> of both the houses to resolve the deadlock.	President can summon the joint sitting of the two houses.	President can summon the joint sitting of the two houses.

## Supreme Court Directive on Quota in Promotions

### Why in News

Recently, the **Supreme Court** asked the **Attorney General** to compile the various issues being raised by States with regard to the application of a **Constitution Bench judgment of 2006 in M. Nagaraj case**.

- The directive is **based on a plea by the Centre to refer to a seven-judge Bench the question** whether creamy layer should apply or not to the Scheduled Caste/Scheduled Tribe community while providing them reservation in government promotions.
- The court in M. Nagaraj case had **upheld the application of creamy layer principle to members of the Scheduled Caste/Scheduled Tribe communities in promotions**.

### Key Points

- **Creamy Layer:**
  - The term '**Creamy layer**' was first mentioned in the Supreme Court's landmark judgment in the **Indra Sawhney case (1992)**.
  - This term is used to describe some members of a backward class who are **socially, economically as well as educationally advanced** as compared to the rest of the members of that community.
  - They **lap up all the benefits of reservations** meant for that class, without allowing benefits to reach the truly backward members of that class.
- **Reason for Directing Compilation:**
  - The **issues raised by the states** regarding application of **creamy layer principle to members of the SC/ST communities** in promotions are **not common**, hence such issues should be compiled before considering referral to a seven-judge bench.
- **M. Nagaraj Case (2006):**
  - **Reversed the stance in the Indra Sawhney case:** In this case applying the creamy layer concept in SC/ST reservation in promotions, the Supreme court reversed its earlier stance in the **Indra Sawhney case (1992)**, in which it had excluded the creamy layer concept on SCs/STs (that was applicable on OBCs).
  - **Directives to the states:** The five-judges Bench in Nagaraj case upheld the constitutional validity of all

Note:



77<sup>th</sup>, 81<sup>st</sup>, 82<sup>nd</sup>, and 85<sup>th</sup> constitutional amendments enabling reservation of SC/ST communities in promotions, but made certain directives for the states:

- State is **not bound to make reservations** for SC/ST in the matter of promotions.
  - If a State wants to provide reservation to the SC/ST communities in promotions:
    - It has to collect **quantifiable data** showing backwardness of the class.
    - **Show inadequacy of representation of that class** in public employment in addition to compliance of Article 335.
  - State needs to ensure that its reservation provision **does not lead to excessiveness-breaching the ceiling-limit of 50%**, or destroying the creamy layer principle.
- **Other Related Judgements:**
- In **Jarnail Singh v L.N. Gupta (2018)** case, SC refused to refer the Nagaraj judgment to a higher bench but later altered the decision by saying that **states will not be required to present quantifiable data of backwardness** of SC/ST communities.
  - **Reservation in Promotions is not a Fundamental Right:**
    - Reaffirming its stand in Nagaraj case, the Supreme Court in 2020 ruled that **reservation in the matter of promotions in public posts is not a fundamental right**, and a state cannot be compelled to offer the quota if it chooses not to.
- **Current Demand by the Centre:** The Centre asked the Court to review its stance of introducing the concept of creamy layer in SC/ST promotions on various issues:
- **Could deprive backward classes from reservation:** The government believes that the 'creamy layer' will become a trick to deprive the backward classes of the benefit of reservation.
  - **Redundancy of proving backwardness again:** It is presumed that once they are added in the Presidential List under Articles 341 and 342 of the Constitution of India, there is no question of proving backwardness of the SCs and STs all over again.
    - The said List cannot be altered by anybody except Parliament under **Articles 341 and 342**-defining who will be considered as SCs or STs in any state or Union Territory.

### Constitutional Provisions for Promotion in Reservation

- **Article 16 (4):** Provides that the State can make any **provision for the reservation of appointments or posts in favour of any backward class** of citizens who, in the opinion of the state, are not adequately represented in the services under the State.
- **Article 16 (4A):** Provides that the State can make any **provision for reservation in matters of promotion** in favour of the Scheduled Castes and the Scheduled Tribes if they are not adequately represented in the services under the State.
  - It was inserted by the **77<sup>th</sup> Constitutional Amendment Act, 1995**.
- **Article 16(4B):** Added by the **81<sup>st</sup> Constitutional Amendment Act, 2000** which enabled the **unfilled SC/ST quota of a particular year to be carried forward to the next year**.
- **Article 335:** It recognises that special measures need to be adopted for considering the claims of SCs and STs to services and posts, in order to bring them at par.
  - **82<sup>nd</sup> Constitutional Amendment Act, 2000** inserted a condition at the end of Article 335 that enables the state to make any provision in favour of the members of the SC/STs for relaxation in qualifying marks in any examination.

## Modified Scheme to Produce 1G Ethanol

### Why in News

Recently, the **Department of Food & Public Distribution** has **notified a modified scheme** for **extending financial assistance for producing 1<sup>st</sup> Generation (1G) ethanol**.

- The aim is to achieve blending targets of ethanol with petrol (**Ethanol Blending Programme**).

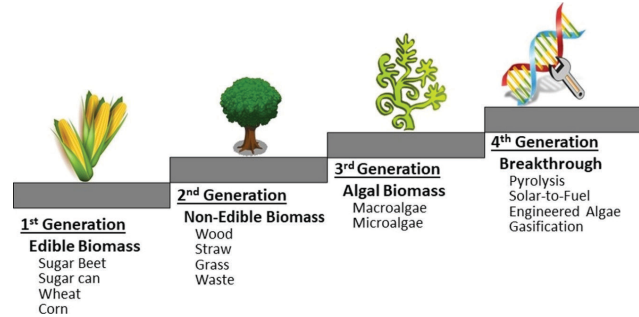
### Key Points

- **Ethanol Blending Programme (EBP):**
  - **Aim:** It aims at **blending ethanol with petrol**, thereby bringing it under the category of **biofuels** and saving millions of dollars by **cutting fuel imports** and **decreasing carbon emissions**.
  - **Target:** The target is to **achieve 20% blending of ethanol by 2025**.

Note:

- **Ethanol Extraction from Foodgrains:**
  - In **2018**, the Central Government **extended the ambit of the EBP programme** to extract the **fuel from surplus quantities of food grains** such as maize, jawar, bajra fruit and vegetable waste.
  - Earlier, **only excess sugarcane production** was allowed to be converted into ethanol for procurement under the programme.
- **Financial Assistance for Expansion of Ethanol Distillation Capacity:** The government will provide **interest subvention (on loans)** to encourage the funding in this sector.
- **Aim:**
  - To set up distilleries for producing **1<sup>st</sup> Generation (1G) ethanol** from feed stocks such as **cereals** (rice, wheat, barley, corn & sorghum), sugarcane, sugar beet etc.
  - To convert molasses (a sugar byproduct) based distilleries to dual feedstock.
- **Expected Benefits:**
  - **Enhancing Farmers' Income:**
    - Facilitate **farmers to diversify their crops** to cultivate particularly maize/corn which needs less water compared to sugarcane and rice.
  - **Provide Employment:**
    - Investment in **capacity addition or establishment of new distilleries** shall provide new employment opportunities in rural areas.
  - **Promote Distributed Ethanol Production:**
    - Bringing **new grain based distilleries** in the entire country would result in **distributed production of ethanol** and would **save a lot of transportation cost** and thus prevent delays in meeting the blending target.
- **Related Initiatives:**
  - **E20 Fuel:** Earlier, the Indian government had invited public comments for introducing adoption of **E20 fuel** (a blend of 20% ethanol with gasoline).
  - **Pradhan Mantri JI-VAN Yojana, 2019:** The objective of the **scheme** is to create an ecosystem for setting up commercial projects and to boost research and development in the 2G Ethanol sector.
  - **Reduction in GST:** The Government has also reduced **GST** on ethanol for blending in fuel from 18% to 5%.

- **National Biofuel Policy 2018:** The Policy **categorises biofuels** as “Basic Biofuels” viz. First Generation (1G) bioethanol & biodiesel and “Advanced Biofuels” - Second Generation (2G) ethanol, Municipal Solid Waste (MSW) to drop-in fuels, Third Generation (3G) biofuels, bio-CNG etc. to enable extension of appropriate financial and fiscal incentives under each category.



## Collegium System for the Appointment of Judges

### Why in News

Recently, the **Supreme Court (SC)** questioned the government about the delay in clearing **Collegium recommendations for judicial appointments** to various High Courts (HC).

### Key Points

- **Collegium System:**
  - It is the **system of appointment and transfer of judges that has evolved through judgments of the SC**, and not by an Act of **Parliament** or by a provision of the Constitution.
    - **Evolution of the System:**
      - **First Judges Case (1981):**
        1. It declared that the “**primacy**” of the **Chief Justice of India (CJI)**s recommendation on judicial appointments and transfers can be refused for “**coherent reasons**.”
        2. The **ruling gave the Executive primacy over the Judiciary in judicial appointments** for the next 12 years.
      - **Second Judges Case (1993):**
        1. SC **introduced the Collegium system**, holding that “**consultation**” really meant “**concurrence**”.

Note:

2. It added that it was not the CJI's individual opinion, but an institutional opinion formed in consultation with the two senior-most judges in the SC.

■ **Third Judges Case (1998):**

1. SC on President's reference **expanded the Collegium to a five-member body**, comprising the CJI and four of his senior-most colleagues.

○ The **SC collegium is headed by the CJI and comprises four other senior most judges** of the court.

○ A **HC collegium is led by its Chief Justice and four other senior most judges of that court.**

● Names recommended for appointment by a HC collegium reaches the government only after approval by the CJI and the SC collegium.

○ Judges of the higher judiciary are appointed only through the collegium system and the **government has a role only after names have been decided by the collegium.**

● The **government's role is limited to getting an inquiry conducted by the Intelligence Bureau (IB)** if a lawyer is to be elevated as a judge in a High Court or the Supreme Court.

■ **Intelligence Bureau (IB):** It is a reputed and established intelligence agency. It is authoritatively controlled by the **Ministry of Home Affairs.**

● It **can also raise objections** and seek clarifications regarding the collegium's choices, **but if the collegium reiterates** the same names, the government is bound, under Constitution Bench judgments, to appoint them as judges.

➤ **Procedure for Various Judicial Appointments:**

○ **For CJI:**

● The **President of India appoints the CJI and the other SC judges.**

● As far as the CJI is concerned, the outgoing CJI recommends his successor.

● In practice, it has been strictly by seniority ever since the supersession controversy of the 1970s.

○ **For SC Judges:**

● For other judges of the SC, the proposal is initiated by the CJI.

● The **CJI consults the rest of the Collegium members**, as well as the senior-most judge of the court hailing from the High Court to which the recommended person belongs.

● The consultees must record their opinions in writing and it should form part of the file.

● The Collegium sends the recommendation to the Law Minister, who forwards it to the Prime Minister to advise the President.

○ **For Chief Justice of High Courts:**

● The Chief Justice of High Court is appointed as per the policy of having Chief Justices from outside the respective States.

● The Collegium takes the call on the elevation.

● High Court judges are recommended by a Collegium comprising the CJI and two senior-most judges.

● The proposal, however, is initiated by the outgoing Chief Justice of the High Court concerned in consultation with two senior-most colleagues.

● The recommendation is sent to the Chief Minister, who advises the Governor to send the proposal to the Union Law Minister.

➤ **Criticism of the Collegium System:**

○ Opaqueness and a lack of transparency.

○ Scope for nepotism.

○ Embroilment in public controversies.

○ Overlooks several talented junior judges and advocates.

➤ **Attempts to reform the Appointment System:**

○ The attempt made to replace it by a '**National Judicial Appointments Commission**' was struck down by the court in 2015 on the ground that it posed a threat to the independence of the judiciary.

**Related Constitutional Provisions**

➤ **Article 124(2)** of the Indian Constitution provides that the Judges of the Supreme Court are appointed by the President after consultation with such a number of the Judges of the Supreme Court and of the High Courts in the States as the President may deem necessary for the purpose.

➤ **Article 217** of the Indian Constitution states that the Judge of a High Court shall be appointed by the President consultation with the Chief Justice of India, the Governor of the State, and, in the case of appointment of a Judge other than the Chief Justice, the Chief Justice of the High Court.

Note:



## Cyber Insurance Policy

### Why in News

A committee set up by the **Insurance Regulatory and Development Authority of India (IRDAI)** has recommended the introduction of a **cyber insurance policy**.

- Cyber insurance policy is a risk transfer mechanism for cyber risk.
  - Cyber risk is commonly defined as exposure to harm or loss resulting from breaches of or attacks on information systems.
- This policy will protect the policyholders from **cybercrimes**.

### Key Points

- **Background:**
  - In October 2020, the IRDAI had set up a committee for cyber liability insurance under **P Umesh**.
  - Amid the **Covid-19 pandemic**, there has been rising incidences of **cyberattacks** and a growing number of high-profile data violations.
- **Data highlighted:**
  - According to the committee report, the **number of internet users in India** is currently estimated at **700 million**.
  - India was ranked as the **second-largest online market** worldwide in 2019, coming second only to China.
  - The **number of internet users is estimated to increase in both urban as well as rural regions**. This number is increasing rapidly so also is the **number of users of online banking**.
- **Features of an Individual cyber insurance policy (cover):**
  - Theft of Funds, Identity Theft Cover, Social Media cover, Cyber Stalking, Malware Cover, Phishing cover, Data Breach and Privacy Breach Cover, etc
- **Recommendations:** Cyber insurance policies currently available address requirements of individuals reasonably well. However, there are some areas in the product features and processes which need improvement.
  - **FIR on higher claims:**
    - Insurers should not insist on police FIR (First Information Report) for claims upto Rs. 5,000.

- FIR is a critical requirement to assess claims.
- **Clarity:**
  - Clarity in exclusion language relating to compliance with reasonable practices and precautions and need for coverage for bricking costs.
    - **Bricking** refers to a loss of use or functionality of hardware as a result of a cyber event.
- **On Standardisation of Cyber Insurance Policy:**
  - Cyber risks are dynamic and evolving. Standardisation is a good idea but may not be able to address all the emerging risks and is likely to limit innovation.

### Cyber Security

#### ➤ About

- In computers and computer networks, an attack is any attempt to expose, alter, disable, destroy, steal or gain unauthorized access to or make unauthorized use of an asset.
- A cyberattack is any type of offensive maneuver that targets computer information systems, infrastructures, computer networks, or personal computer devices.

#### ➤ Need

- According to **Nasscom's Data Security Council of India (DSCI) report 2019**, India witnessed the **second-highest** number of cyber attacks in the world between 2016 and 2018.

#### ➤ Ways of Cyberattack:

- **Phishing or Spoofing attacks:**
  - Spoofing is an identity theft where a person is trying to use the identity of a legitimate user. Phishing is where a person steals the sensitive information of users like bank account details.
- **Malware or Spyware:**
  - Spyware is classified as a type of malware (malicious software) designed to gain access to or damage one's computer, often without one's knowledge. Spyware gathers one's personal information and relays it to advertisers, data firms, or external users.
- **SIM Swap:**
  - Original SIM gets cloned and becomes invalid, and the duplicate SIM can be misused to access the user's online bank account to transfer funds.

Note:



- **Credential Stuffing (compromising devices and stealing data):**
  - Credential stuffing is a type of cyberattack where stolen account credentials typically consisting of lists of usernames and/or email addresses and the corresponding passwords are used to gain unauthorized access to user accounts through large-scale automated login requests directed against a web application.
- **Man-in-the-middle attacks** during online payments or transactions, etc.
- **Government Initiatives to tackle cyber attacks:**
  - **Cyber Surakshit Bharat Initiative:**
    - It was launched in 2018 with an aim to spread awareness about cybercrime and building capacity for safety measures for Chief Information Security Officers (CISOs) and frontline IT staff across all government departments.
  - **National Cybersecurity Coordination Centre (NCCC):**
    - Its mandate is to scan internet traffic and communication metadata (which are little snippets of information hidden inside each communication) coming into the country to detect real-time cyber threats.
  - **Cyber Swachhta Kendra:**
    - In 2017, this platform was introduced for internet users to clean their computers and devices by wiping out viruses and malware.
  - **Information Security Education and Awareness Project (ISEA):**
    - A project to raise awareness and to provide research, education and training in the field of Information Security.
  - **National Computer Emergency Response Team (CERT-In)** functions as the nodal agency for coordination of all cyber security efforts, emergency responses, and crisis management.
  - Protection and resilience of critical information infrastructure with the **National Critical Information Infrastructure Protection Centre (NCIIPC)** operating as the nodal agency.
    - NCIIPC was created under the Information Technology Act, 2000 to secure India's critical information infrastructure.
  - **Information Technology Act, 2000:**
    - **The Act** regulates use of computers, computer

systems, computer networks and also data and information in electronic format.

#### ➤ **International Mechanisms:**

- **The International Telecommunication Union (ITU) :** It is a **specialized agency within the United Nations** which plays a leading role in the standardization and development of telecommunications and cyber security issues.
- **Budapest Convention on Cybercrime:** It is an **international treaty** that seeks to address Internet and computer crime by harmonizing national laws, improving investigative techniques, and increasing cooperation among nations. It came into force on 1<sup>st</sup> July 2004. **India is not a signatory** to this convention.
- **Internet Governance Forum (IGF):** It brings together all stakeholders i.e. government, private sector and civil society on the Internet governance debate.

## Bringing a Law into Force

### *Why in News*

The farmers have **rejected the government's offer of keeping the three contentious farm laws on hold** for one to one-and-a-half years. Farmers insist that the **laws be repealed**.

- Over the years, **Parliament has repealed several laws** and there have also been precedents of the **government not bringing a law into force for several years** after it has been passed.

### *Key Points*

#### ➤ **Bringing/Repealing a Law:**

- **Parliament has the power to make a law and to remove it** from the statute books (a law can be struck down by the judiciary if it is unconstitutional).
- A **Bill is a draft proposal**, which needs to be **passed in the Lower and Upper House**, and only after the **President gives his assent, it becomes an Act**.
- **Repeal** means to **revoke, abrogate or cancel particularly a statute**. Any statute may repeal any Act in whole or in part, either expressly or impliedly by enacting matters contrary to and inconsistent with the prior legislation.

#### ➤ **President's Assent:**

Note:

- **Article 111 of the Constitution** specifies that the **President can either sign off on the Bill or withhold his consent.**
- **A Bill is sent to Parliament for reconsideration** if the President withholds his assent on it. And if Parliament sends it back to the President, he has no choice but to approve it. Thus, the **President enjoys only a 'suspensive veto'.**
- **Making Law Operational:**
  - **Rules & Regulation: Parliament gives the government the responsibility** of making rules and regulations for efficient functioning of the Act.
    - The government not only has the power to make rules but **can also suppress rules** made by it earlier.
    - If the government does not make rules and regulations, **a law or parts of it will not get implemented.**
    - **The Benami Transactions Act of 1988** is an **example** of a **complete law remaining unimplemented** in the absence of regulations.
  - **Time Period:** Parliament has recommended that the government make rules **within six months of passing a law.**
    - A **parliamentary committee** has observed that this recommendation is **"being followed in breach by various ministries"**.

#### Veto Power of the President

- **Three Types of Veto Power:** Absolute veto, Suspensive veto and Pocket veto.
- **Exception:** The President has **no veto power** when it comes to the **constitutional amendment bills.**
- **Absolute Veto:**
  - **Meaning:** It refers to the power of the President to **withhold his assent to a bill** passed by the Parliament. The **bill then ends and does not become an act.**
  - **Generally Used in Following Two Cases:**
    - When the bill passed by the Parliament is a **Private Member Bill.**
    - **When the cabinet resigns** before the President could give his assent to the bill. The new cabinet may advise the President to not give his assent to the bill passed by the old cabinet.
- **Suspensive Veto:**

- **Meaning:**
  - The President uses a suspensive veto when he **returns the bill to the Indian Parliament for its reconsideration.**
  - If the Parliament **resends the bill with or without amendment** to the President, he **has to approve the bill without using any of his veto powers.**
- **Exception:** The President **cannot exercise his suspensive veto** in relation to **Money Bill.**
- **Pocket Veto:**
  - **Meaning:** The **bill is kept pending by the President for an indefinite period** when he exercises his pocket veto.
    - He **neither rejects the bill nor returns the bill for reconsideration.**
    - **Unlike the American President** who has to **resend the bill within 10 days,** the **Indian President has no such time-rule.**
- **Veto over State Bills:**
  - The **governor is empowered to reserve certain types of bills passed by the state legislature for the consideration of the President.**
  - The President **can withhold his assent to such bills not only in the first instance but also in the second instance.**
    - Thus, the President **enjoys absolute veto (and not suspensive veto) over state bills.**
  - Further, the President **can exercise pocket veto** in respect of state legislation also.

## Premium for Traffic Violation

### Why in News

A Working Group set up by the **Insurance Regulatory and Development Authority of India (IRDAI)** for Traffic Management has recently proposed to add **"traffic violation premium"** to the vehicle insurance policy.

- Previously in **September 2019,** the IRDAI constituted the Working Group to examine the establishment of a system of Linking Motor Insurance Premium with Traffic Violations.

### Key Points

- **About the Premium:**

Note:

- Vehicle owners may have to pay **insurance premium** depending on the **traffic violations involving the vehicle**.
- The working group has recommended inserting a **fifth section to motor insurance** called “**traffic violation premium**” in addition to **motor own damage insurance, basic third-party insurance, additional third party insurance and compulsory personal accident premium**.
- **Calculation of Premium:**
  - A system of calculating **traffic violation points basis frequency and severity of different traffic offences**.
  - The amount of traffic violation premium will depend upon **driving habits** which will be determined by the **number and types of challans**.
  - Traffic violation premium shall be payable by the **registered owner of the vehicle**, whether an individual or an entity.
- **Calculation of Points:**
  - As per the table of offences provided by the working group, drinking driving will attract the highest penalty of **100 points**, while wrong parking will have **10 points penalty**. The **amount of premium** will be **linked to these penalty points**.
- **Data Storage:**
  - The data of traffic challans will be stored by the **National Informatics Centre (NIC)** and shared with the **Insurance Information Bureau of India (IIB)** on a daily basis.
    - IIB aims to provide **information support in a Complete, Consistent, and Concise manner**, to all **stakeholders associated** either directly or indirectly with the **Insurance Sector**, including Insurers, Regulator and Government Agencies.
- **Mechanism:**
  - The **premium is on the vehicle and not on the driver**. This means when a **new vehicle is bought**, it will start with a **clean traffic violation history and its owner**, when buying motor insurance, will **not need to pay any traffic violation premium**, even if he has a past traffic violation history, either as a driver of a vehicle owned by another person or his own vehicle of similar or a different category.
- **However**, if a person **renews motor insurance**, s/he will be **assessed for her/his traffic violation points and traffic violation premium** s/he needs to pay.
- In case of **transfer of insurance** of a vehicle after sale, the traffic violation premium **would start from ground zero** from the date of vehicle ownership transfer and build depending upon the traffic violations caused by vehicle after ownership transfer.
- **Use of technology:**
  - Insurance Information Bureau of India (IIB) will coordinate with **various States Traffic Police and National Informatics Centre** to capture the **traffic violation data**, calculate violation points of each violating vehicle and make this information available to all general insurers through IT system integration with insurers.
- **Road Accidents in India:**
  - According to the **Ministry of Road Transport, Road Accidents Report issued in 2018**, India witnessed **4.67 lakh road accidents** that killed **1.51 lakh citizens**.
  - India ranks **first in the number of road accident deaths** across the **199 countries** reported in the **World Road Statistics, 2018** followed by China and US.
- **Other Government Measures:**
  - The government has already introduced heavy penalties on different types of traffic violations in the amended **Motor Vehicles Act 2019**. In addition, the Government of India is also focusing on **Intelligent Traffic Management System** in the Metropolitan and smart cities.

## Governor's Delay on Mercy Petition

### *Why in News*

Recently, the **Solicitor General** told the **Supreme Court (SC)** that Tamil Nadu **Governor** will take a decision in the next three or four days on **mercy petition** of a convict in the 1991 Rajiv Gandhi assassination case.

- The **concept of Mercy Petition is followed in many nations** like the USA, UK, Canada etc. including India.

Note:



- In **India**, the power to grant pardon is entrusted to the President and the Governors of various states under Article 72 and Article 161 of the Constitution. It adds a human touch to the country's judicial process by conferring powers to grant pardon or show Mercy to criminals sentenced to death.

### Key Points

- **Background:**
  - A **pardon request moved by the convict in 2015** was not considered by the Governor, however, a SC order on a related petition in September 2018 **clarified that the Governor was "deemed fit" to decide on the pardon.**
  - Thereafter a recommendation to remit his life sentence was advised by the Cabinet under **Article 161.**
  - However, the Governor's decision is still pending.
- **Centre's Stand:**
  - The pleas for pardon and release should go to the **President** instead of the Governor as the case is being investigated by a central agency.
- **Petitioner's Argument:**
  - A convict was **free to choose between the President and the Governor for pardon.**
  - Referred to the Constitution Bench's judgment in the **Union of India versus Sriharan 2015**, which said the **"exercise of executive clemency" was "vested in the President or the Governor".**
  - Centre's rejection in 2018 of the Tamil Nadu government proposal to remit the sentence of the convicts under **Section 432** of the **Code of Criminal Procedure (CrPC)** did not stop the convicts from separately moving the Governor for pardon under **Article 161.**
    - **Section 432 of the CrPC:** It lays down that the **appropriate government**, at any time, without conditions or upon any conditions which the person sentenced accepts, **can suspend the execution of his sentence or remit the whole or any part of the punishment to which he has been sentenced.**
- **SC's Observation:**
  - The SC termed the Governor's delay **"extraordinary"**. It also noted how a decision was **not forthcoming despite the State government's recommendation.**

- It needs to be noted that **the Governor cannot reject the state's recommendation but there is no time prescribed to take a decision.**
- The Governor **had already returned the file to reconsider the government's decision but the government stood by its decision.**

### Pardoning Power

#### ➤ Pardoning Power of the President in India:

##### ○ About:

- Under **Article 72 of the Constitution**, the President shall have the power to grant pardons, reprieves, respites or remissions of punishment or to suspend, remit or commute the sentence of any person convicted of any offence where the sentence is a sentence of death.

##### ○ Limitation:

- The President **cannot exercise his power of pardon independent of the government.**
- In several cases, the SC has ruled that the **President has to act on the advice of the Council of Ministers** while deciding mercy pleas. These include **Maru Ram vs Union of India in 1980**, and **Dhananjoy Chatterjee vs State of West Bengal in 1994.**

##### ○ Reconsideration:

- Although the President is bound by the Cabinet's advice, **Article 74 (1) empowers him to return it for reconsideration once.** If the Council of Ministers decides against any change, the **President has no option but to accept it.**

#### ➤ Governor's Pardoning Power:

- **Article 161:** The Governor of a State shall have the **power to grant pardons, reprieves, respites or remissions of punishment or to suspend, remit or commute the sentence** of any person convicted of any offence against any law relating to a matter to which the executive power of the State extends.

#### ➤ Difference Between Pardoning Powers of President and Governor:

- The scope of the **pardoning power of the President under Article 72 is wider than the pardoning power of the Governor under Article 161** which differs in the following two ways:

Note:



- **Court Martial:** The power of the President to grant pardon extends in cases where the punishment or sentence is by a Court Martial but Article 161 does not provide any such power to the Governor.
- **Death sentence:** The President can grant pardon in all cases where the sentence given is the sentence of death but the pardoning power of the Governor does not extend to death sentence cases.

## CVC on Delay in Investigations

### Why in News

The **Central Vigilance Commission (CVC)** has recently directed all Ministries/Departments of the Union government to strictly **adhere to the time limits for various stages of disciplinary proceedings in vigilance cases** since delays were causing undue advantage or harassment to the charged officials.

### Key Points

- **Issue:**
  - The CVC has earlier also expressed concerns that despite clear guidelines issued by the **CVC** and the **Department of Personnel & Training**, investigators were not adhering to the **prescribed time limit**, resulting in **investigations taking a much longer time**.
  - **The Supreme Court** has also ordered for limiting the **period of stay granted by a court of law to six months**, barring exceptional cases.
- **Reasons for Pendency:**
  - Stay granted by a court of law
  - Case pending in a court of law
  - Case kept in abeyance since official had been terminated from service
- **Impact:**
  - **Set's Poor Precedent:**
    - Undue delay provided **prolonged opportunities to a corrupt public servant** to indulge in inappropriate activities.
  - **Disincentives honest officials:**
    - Any delay in the conclusion of vigilance related matters is detrimental for an honest public servant, who may have got involved in a vigilance case.

### Central Vigilance Commission (CVC)

- Central Vigilance Commission is the **apex vigilance institution**, free of control from any executive authority, monitoring all vigilance activity under the **Central Government** and advising various authorities in Central Government organizations in planning, executing, reviewing and reforming their vigilance work.
- **Formation:**
  - The CVC was set up by the Government in 1964 on the recommendations of the Committee headed by **Shri K. Santhanam**. In 2003, the Parliament enacted **CVC Act** conferring **statutory status on the CVC**.
- **Functions:**
  - The CVC receives complaints on **corruption or misuse of office** and to recommend appropriate action. Following institutions, bodies, or a person can approach to CVC:
    - Central government
    - Lokpal
    - Whistle blowers
  - It is not an **investigating agency**. The CVC either gets the investigation done through the **Central Bureau of Investigation** or through **Chief Vigilance Officers (CVO)** in government offices.
- **Governance:**
  - The Central Vigilance Commission has its own **Secretariat, Chief Technical Examiners' Wing (CTE)** and a **wing of Commissioners for Departmental Inquiries (CDI)**. For investigation work, CVC has to depend on two external sources **CBI and Chief Vigilance Officers (CVO)**.
  - **The Central Vigilance Commission:**
    - The Multi-member Commission consists of a **Central Vigilance Commissioner** (Chairperson) and not more than **two Vigilance Commissioners** (Member).
    - The Central Vigilance Commissioner and the Vigilance Commissioners are appointed by the **President** on the recommendations of a **Committee** consisting of the **Prime Minister** (Chairperson), the **Minister of Home Affairs** (Member) and the **Leader of the Opposition** in the House of the People (Member).
    - **Chief Vigilance Officers (CVO):**
      - Vigilance administration in Departments/

Note:

Organisations is headed by the **Chief Vigilance Officers (CVO)** and the Commission's activities concerning inquiry or causing inquiry are supported by/carried out through the **CVOs**.

- **CVOs in all Departments/organisations** are appointed after prior consultation with the Commission.
- **Term:**
  - Their term is **4 years or 65 years**, whichever is earlier.
- **Removal:**
  - The Central Vigilance Commissioner or any Vigilance Commissioner can be removed from his office only by **order of the President** on the ground of **proved misbehavior or incapacity after the Supreme Court**, on a reference made to it by the President, has, on **inquiry**, reported that the Central Vigilance Commissioner or any Vigilance Commissioner, as the case may be, ought to be removed.

## Pradhan Mantri Kaushal Vikas Yojana 3.0

### Why in News

The **Ministry of Skill Development and Entrepreneurship (MSDE)** has launched **Pradhan Mantri Kaushal Vikas Yojana (PMKVY) 3.0**, in a bid to empower India's youth with employable skills by **making over 300 skill courses available** to them.

### Key Points

- **Background:**
  - **Skill India Mission** was launched by the government in **2015** under which the flagship scheme Pradhan Mantri Kaushal Vikas Yojana (PMKVY) is run.
  - It **aims to train over 40 crore people in India in different skills by 2022**. It aims at **vocational training and certification** of Indian youth for a better livelihood and respect in the society.
- **PMKVY 1.0:**
  - **Launch: India's largest Skill Certification Scheme - Pradhan Mantri Kaushal Vikas Yojana (PMKVY)** - was launched on 15<sup>th</sup> July, 2015 (**World Youth Skills Day**).

- **Aim:** To encourage and promote skill development in the country by providing **free short duration skill training** and incentivizing this by providing **monetary rewards to youth for skill certification**.
- **Implementation:** PMKVY is implemented by the **National Skills Development Corporation (NSDC)** under the guidance of the **Ministry of Skill Development and Entrepreneurship (MSDE)**.
- **Key Components:** Short Term Training, Special Projects, **Recognition of Prior Learning**, Kaushal & Rozgar Mela, etc.
- **Outcome:** In 2015-16, 19.85 lakh candidates were trained.
- **PMKVY 2.0:**
  - **Coverage: PMKVY 2016-20 (PMKVY 2.0)** was launched by scaling up **both in terms of Sector and Geography** and by **greater alignment with other missions** of the Government of India like **Make in India, Digital India, Swachh Bharat**, etc.
  - **Budget:** Rs. 12,000 Crore.
  - **Implementation Through Two Components:**
    - **Centrally Sponsored Centrally Managed (CSCM):** This component was **implemented by National Skill Development Corporation**. 75% of the PMKVY 2016-20 funds and corresponding physical targets have been allocated under CSCM.
    - **Centrally Sponsored State Managed (CSSM):** This component was **implemented by State Governments** through State Skill Development Missions (SSDMs). 25% of the PMKVY 2016-20 funds and corresponding physical targets have been allocated under CSSM.
  - **Outcome:** More than **1.2 Core youth** have been trained/oriented through an improved standardized skilling ecosystem in the country under PMKVY 1.0 and PMKVY 2.0.
- **PMKVY 3.0:**
  - **Coverage:** Launched in 717 districts, 28 States/eight UTs, PMKVY 3.0 is a step towards '**Atmanirbhar Bharat**'.
  - **Implementation:** It **will be implemented in a more decentralized structure** with greater responsibilities and support from States/UTs and Districts.
    - District Skill Committees (DSCs), under the guidance of State Skill Development Missions (SSDM), shall play a key role in addressing the skill gap and assessing demand at the district level.

Note:



### ○ Features:

- It envisages training of eight lakh candidates over a scheme period of 2020-2021 with an outlay of Rs. 948.90 crore.
  - The 729 Pradhan Mantri Kaushal Kendras (PMKKs), empaneled non-PMKK training centres and more than 200 Industrial Training Institutes (ITIs) under Skill India will be rolling out PMKVY 3.0 training to build a robust pool of skilled professionals.
- It will be more trainee- and learner-centric. The focus is on bridging the demand-supply gap by promoting skill development in areas of new-age and Industry 4.0 job roles.
- It will be a propagator of vocational education at an early level for youth to capitalize on industry-linked opportunities.
  - The National Educational Policy 2020 also puts focus on vocational training for a holistic growth and increased employability.
- By taking the bottom-up approach to training, it will identify job roles that have demand at the local level and skill the youth, linking them to these opportunities (Vocal for Local).
- It will encourage healthy competition between states by making available increased allocation to those states that perform better.

## Question Hour to Resume during Budget Session

### Why in News

Question Hour, which had been suspended by the government during the monsoon session, will resume when Parliament meets for the budget session.

- The suspension was done in view of the Covid-19 pandemic. The government had also cancelled the winter session of Parliament citing a rising number of Covid cases.

### Key Points

#### ➤ Question Hour (Description):

- The first hour of every parliamentary sitting is slotted for the Question Hour. However, in 2014, the Question Hour was shifted in the Rajya Sabha from 11 am to 12 noon.

- During this one hour, Members of Parliament (MPs) ask questions to ministers and hold them accountable for the functioning of their ministries.
- The questions can also be asked to the private members (MPs who are not ministers).
- Regulation: It is regulated according to parliamentary rules.
  - The presiding officers of the both Houses (Rajya Sabha and Lok Sabha) are the final authority with respect to the conduct of Question Hour.
- Types of Questions: There are three kinds of questions asked:
  - Starred question (distinguished by an asterisk): This requires an oral answer and hence supplementary questions can follow.
  - Unstarred question: This requires a written answer and hence, supplementary questions cannot follow.
  - Short notice question: It is one that is asked by giving a notice of less than ten days. It is answered orally.
- Frequency: Question Hour in both Houses is held on all days of the session. But there are two days when an exception is made.
  - When the President addresses MPs from both Houses.
    - The President's speech takes place at the beginning of a new Lok Sabha and on the first day of a new Parliament year.
  - On the day the Finance Minister presents the Budget.
- Previous Sessions Without Question Hour:
  - In the past too, the Question Hour has been suspended. They were suspended during national emergencies.
- Importance of Question Hour:
  - Parliamentary Right: Asking of questions is an inherent and unfettered parliamentary right of members.
  - Holds Government Accountable:
    - It is during the Question Hour that the members can ask questions on every aspect of administration and Governmental activity.
      - Government policies in national as well as international spheres come into sharp focus.
    - Like in trials, during the Question Hour, every Minister has to answer for their acts of administrative omission and commission.

Note:



- **Adaptation of Policies:** Through the Question Hour, the Government is able to quickly feel the **pulse of the nation** and adapt its policies and actions accordingly.
- **Appointment of a Commission:** Sometimes questions may lead to the appointment of a Commission, a **Court of Enquiry** or even Legislation when matters raised by Members are of wide public importance.

### Sessions of Parliament

#### ➤ **Summoning of Parliament:**

- The summoning of Parliament is specified in **Article 85 of the Constitution.**
- The **power to convene a session** of Parliament rests with the government.
  - The decision is taken by the **Cabinet Committee on Parliamentary Affairs** which is formalised by the President, in whose name MPs are summoned to meet for a session.

#### ➤ **Schedule of the Sessions:**

- India does not have a fixed parliamentary calendar.
- However, the gap between two sessions of the Parliament cannot exceed 6 months, which means the **Parliament meets at least two times in one year.**
- By convention (i.e. not provided by the Constitution), Parliament meets for **three sessions** in a year.
  - **Budget Session:** The **longest**, Budget Session (1<sup>st</sup> session), starts towards the end of January, and concludes by the end of April or first week of May.
    - The session has a recess so that Parliamentary Committees can discuss the budgetary proposals.
  - **Monsoon Session:** The second session is the three-week Monsoon Session, which usually begins in July and finishes in August.
  - **Winter Session:** It is the third session held from November to December.

## Regulatory Compliance Portal: DPIIT

### Why in News

Recently, the **Department for Promotion of Industry**

**and Internal Trade (DPIIT)** has launched a **regulatory compliance portal** that will act as a bridge for citizens, industries and the government to **minimise burdensome compliances.**

- **DPIIT** comes under the **Ministry of Commerce and Industry.** It is acting as the **nodal department** for coordinating the exercise of minimizing regulatory compliance burden for citizens and businesses which have an adverse impact on time and cost of businesses.

### Key Points

#### ➤ **Objective:**

- Reduce the **compliance burden**, simplify further the **citizen-government interface** whether online or offline, and **remove antiquated and obsolete acts** which don't add value.
- To **boost manufacturing and make Indian industry competitive**, there are issues of quality and manufacturing of scale but the **compliance burden is a major cost.**

#### ➤ **About the Portal:**

- All **Central Ministries/Departments and States/UTs** would **examine laws/regulations/rules** under their purview and **implement an Action Plan** to rationalize and simplify all the processes and **remove burdensome compliances, decriminalize laws and repeal redundant Acts.** These **details would be captured and tracked on the Regulatory Compliance Portal.**
- It will act as a **first-of-its-kind central online repository** of all central and State-level compliances.
- **Industry stakeholders** from trade bodies such as **CII, FICCI and ASSOCHAM** would also **submit recommendations** to minimize the regulatory compliance burden.
- **Customized reports** of action taken by each Ministry/Department and State/UT will also get generated for monitoring and evaluation.

#### ➤ **Other Related Steps:**

- **Business Reform Action Plan (BRAP) ranking of states** was started in 2015. BRAP 2019 contained a list of 80 reforms (187 reform action points) to be implemented by 19 State departments. These reforms covered 12 business regulatory areas such as Access to Information, Single Window System, Labour, Environment, etc.

Note:

- **Industrial Corridors** are being developed with the objective of fast-tracking growth and facilitating development of a well-planned and resource-efficient industrial base served by world-class sustainable connectivity infrastructure, bringing significant benefits in terms of innovation, manufacturing, job creation and resource security to the nation.
- **Invest India** is the National Investment Promotion and Facilitation Agency of India. It is transforming the country's investment climate by simplifying the business environment for investors.
- **Make in India initiative** was launched in 2014, along with action plans for 25 sectors with the objective of facilitating investment, fostering innovation, building best in class manufacturing infrastructure, making it easy to do business and enhancing skill development.
- **Significance:**
  - **Rise of India's rank in World Bank's Ease of Doing Business Report** from 142<sup>nd</sup> in 2014 to 63<sup>rd</sup> in 2019.
  - The steps taken will be instrumental in achieving the vision of **Atmanirbhar Bharat** and help usher ease of doing business for industry and ease of living for citizens.

## Rooftop Solar Scheme

### **Why in News**

Recently, the **Ministry of New and Renewable Energy (MNRE)** has released an advisory on the **rooftop solar scheme**.

### **Key Points**

- **Objective:**
  - To generate solar power by installing **solar panels** on the roof of the houses, the Ministry of New and Renewable Energy is implementing **Grid-connected Rooftop Solar Scheme (Phase II)**.
  - Grid-Connected Rooftop Solar Scheme (Phase II):
  - It aims to achieve a cumulative capacity of **40,000 MW from Rooftop Solar Projects by the year 2022**.
  - In a grid-connected rooftop or small Solar Photovoltaic (SPV) system wherein **the DC power generated from the SPV panel is converted to AC power** using the power conditioning unit and is fed to the grid.

- The **major objective** of the programme includes:
  - To promote the **grid-connected SPV rooftop** and small SPV power generating plants among the residential, community, institutional, industrial and commercial establishments.
  - To **mitigate the dependence on fossil fuel based electricity generation** and encourage environment-friendly Solar electricity generation.
  - To create an **enabling environment for investment in the solar energy** sector by the private sector, state government and the individuals.
  - To create an enabling environment for the **supply of solar power from rooftop and small plants to the grid**.
- This scheme is being implemented in the state by **distribution companies (DISCOMs)**.
  - Under this scheme the Ministry is providing a **40% subsidy** for the first 3 kW and **20% subsidy** beyond **3 kW** and upto **10 kW** of solar panel capacity.
- The **residential consumer has to pay the cost of rooftop solar plant by reducing the subsidy amount** given by the Ministry as per the prescribed rate to the vendor.
- **Other Schemes for Promoting Solar Energy:**
  - **Kisan Urja Suraksha evam Utthaan Mahabhiyan (PM-KUSUM):**
    - The scheme covers grid-connected Renewable Energy power plants (0.5 – 2 MW)/ Solar water pumps/ grid connected agriculture pumps.
  - **Scheme for Development of Ultra Mega Renewable Energy Power Parks:**
    - It is a scheme to develop Ultra Mega Renewable Energy Power Parks (UMREPPs) under the existing Solar Park Scheme.
  - **National Wind-Solar Hybrid Policy:**
    - The main objective of the National Wind-Solar Hybrid Policy, 2018 is to provide a framework for **promotion of large grid connected wind-solar PV hybrid systems** for optimal and efficient utilization of wind and solar resources, transmission infrastructure and land.
    - The wind - solar PV hybrid systems will help in reducing the variability in renewable power generation and achieving better grid stability.

Note:

- The policy also aims to encourage new technologies, methods and way-outs involving combined operation of wind and solar PV plants.
- **Atal Jyoti Yojana (AJAY):**
  - The AJAY scheme was launched in September 2016 for the installation of **solar street lighting (SSL)** systems in states with less than **50%** households covered with **grid power** (as per Census 2011).
- **International Solar Alliance:** The ISA, is an Indian initiative that was launched by the Prime Minister of India and the President of France on 30<sup>th</sup> November 2015 in Paris, France on the side-lines of the Conference of the Parties (COP-21), with 121 solar resource rich countries lying fully or partially between the tropic of Cancer and tropic of Capricorn as prospective members.
- **One Sun, One World, One Grid (OSOWOG):** It focuses on a framework for facilitating global cooperation, building a global ecosystem of interconnected renewable energy resources (mainly solar energy) that can be seamlessly shared.
- **National Solar Mission (a part of National Action Plan on Climate Change)**
- **Suryamitra Skill Development Programme:** To provide skill training to rural youth in handling solar installations.

## Co-WIN App

### *Why in News*

Recently, the software of **Co-WIN App** (also called **Covid Vaccine Intelligence Network**) was upgraded to improve monitoring and managing of the ongoing **Covid-19 Vaccination programme**.

### *Key Points*

- **Description:**
  - Co-WIN, a **cloud-based IT platform**, is supposed to **handle minute details for India's Covid-19 immunisation programme**, including registering beneficiaries, allocating vaccination centres, sending text messages with name of their vaccinator to beneficiaries and live monitoring of vials in cold storage.
- **Agencies Involved:**

- The Co-WIN platform is **owned by the Ministry of Health and Family Welfare** and **was earlier the platform used for conducting Pulse Polio** and **other crucial immunisation programmes** across the country.
- The same platform has been expanded for doling out Covid-19 vaccines and the **Ministry of Electronics and IT** along with the **National Informatics Centre** are handling the backend and the tech infrastructure for it.

### ➤ **Features:**

- **Monitoring and tracking:** This app enables monitoring the inoculation drive and tracking the listed beneficiaries for vaccination on a real-time basis.
  - Thus, it also helps to **counter proxy vaccinations**.
- **Aadhaar enabled:** This app would enable beneficiaries to be **identified efficiently** through use of **Aadhaar** platform.

## ShramShakti Portal

### *Why in News*

Recently, the **Ministry of Tribal Affairs** has launched "**ShramShakti**" - a **National Migration Support Portal**, to smooth the formulation of state and national level programs for migrant workers.

- A training manual "**ShramSaathi**" was also launched for migrant workers.

### *Key Points*

- **About the Portal:**
  - It has been launched to **collect data related to tribal migrant workers** and link them with the existing welfare schemes.
- **Objectives of ShramShakti Portal:**
  - **To address the data gap:**
    - Various data will be recorded via Shram Shakti include demographic profile, livelihood options, skill mapping and migration pattern.
    - It will help in empowering the workers who generally migrate in search of employment and income generation.
  - **To help in formulation of strategies:**
    - It would help the national and state governments in **formulation of effective strategies** and policy

Note:



decisions for welfare of migrant workers at both source and destination states.

○ **To address the issues various related migrants:**

- Trafficking,
- Wages harassment issues,
- Occupational hazards at the workplace, etc.

○ **Linking with other schemes:**

- This portal will link the migrant population with the existing Welfare Schemes under **Atamnirbhar Bharat**.

➤ **Recent Government Initiatives to Help Migrant Workers:**

○ **ASEEM Portal:**

- The Ministry of Skill Development and Entrepreneurship (MSDE) launched '**AtmaNirbhar Skilled Employee Employer Mapping (ASEEM)**' portal to help skilled people find sustainable livelihood opportunities.
- Database of labour migrants in Indian states and overseas citizens, who returned to India under the **Vande Bharat Mission** and filled **SWADES Skill Card**, has been integrated with the ASEEM portal.

○ **NMIS Dashboard:**

- The **National Disaster Management Authority (NDMA)** has developed an online dashboard called '**National Migrant Information System (NMIS)**'.
- It would **maintain a central repository of migrant workers** and help in **speedy inter-state communication** to facilitate the smooth movement of migrant workers to their native places.

○ **Amalgamation of Labour Laws into Codes:**

- Recently, numerous labour laws have been amalgamated into four labour codes namely **Code on Wages Act 2019, Industrial Relations Code 2020, Code on Social Security 2020, and Occupational Safety, Health and Working Conditions Code 2020**.
- They are also aimed at facilitating industrialisation throughout the nation and thus checking distress labour migration ultimately.

➤ **Initiatives for Tribal Welfare:**

○ **Pradhan Manti Van Dhan Yojana (PMVDY):**

- It is a **market-linked** tribal entrepreneurship development program for **forming clusters of tribal SHGs** and strengthening them into **Tribal Producer Companies**.

- It also aims to **set-up tribal community owned Minor Forest Produce (MFP)-centric multi-purpose Van Dhan Vikas Kendras** (the Kendra) in predominantly tribal districts.

○ **Eklavya Model Residential Schools (EMRSs):**

- **EMRS** started in the year 1997-98 to impart **quality middle and high-level education** to ST children in remote areas and enable them to have access to the best opportunities in education at par with the non ST population.
- These are being set up by grants provided under **Article 275(1) of the Constitution**.

○ **The Tribal Cooperative Marketing Development Federation of India (TRIFED):**

- **TRIFED** came into existence in **1987**. It is a national-level apex organization functioning under the administrative control of the Ministry of Tribal Affairs.
- TRIFED has its key objectives of promoting tribal art & craft, hand looms and set-up tribal community owned Minor Forest Produce (MFP)-centric multi-purpose Van Dhan Vikas Kendras.

## 35<sup>th</sup> Pragati Meeting

### *Why in News*

The Prime Minister of India recently chaired the 35<sup>th</sup> edition of **Pro-Active Governance And Timely Implementation (PRAGATI)** - the Information and Communication Technology (ICT) based multimodal platform, involving Central and State governments.

- Ten projects were taken for review involving a total investment of Rs. 54,675 crore. A review of **Pradhan Mantri Bhartiya Jan Aushadhi Pariyojana** was also taken.

### *Key Points*

➤ **About:**

- Launched in 2015, PRAGATI is the multimodal platform for Pro-Active Governance and Timely Implementation involving central and state governments.

Note:



- It has been designed by the Prime Minister's Office (PMO) team with the help of the **National Informatics Center (NIC)**.
- It enables the PM to discuss the issues with the concerned central and state officials with full information and latest visuals of the ground-level situation.
  - The PRAGATI platform uniquely bundles **three latest technologies**: Digital data management, video-conferencing and geo-spatial technology.
- It is a **three-tier system** (PMO, Union Government Secretaries, and Chief Secretaries of the States).
- **Objective:**
  - Grievance Redressal.
  - Programme Implementation.
  - Project Monitoring.
- **Significance:**
  - It promotes **cooperative federalism** as it brings together the Secretaries of Government of India and the Chief Secretaries of the States.
  - It is a robust system for bringing e-transparency and e-accountability with real-time presence and exchange among the key stakeholders.
  - It is an innovative project in **e-governance** and **good governance**.
- **Concerns:**
  - The direct interaction of the PM with the state secretaries without involving the political executives of the states is undermining the state political executive.
  - It is also said that this is leading to a concentration of power in the extra-constitutional office of PMO.

## Kala Utsav 2020

### **Why in News**

Recently, Kala Utsav 2020 - an annual function to promote arts in education, was organised by the Ministry of Education.

### **Key Points**

#### ➤ **About Kala Utsav:**

- **Ministry Involved:** Kala Utsav is an initiative of the **Ministry of Education (MoE)** to **promote arts in education**.
  - This programme **was initiated** under **Rashtriya Madhyamik Shiksha Abhiyan (RMSA)**, which has now been merged with other schemes under **'Samagra Shiksha – an integrated scheme for school education'**.
- **Aim:** Kala Utsav aims at **nurturing and showcasing the artistic talent of school students** at the secondary stage in the country.
  - **District/State/National Level Utsav** is structured as an **art festival** which includes performances and display of exhibits.
- **In Accordance with NCF 2005:**
  - In the context of education of Arts (Music, Theatre, Dance, Visual Arts and Crafts), the initiative is guided by the recommendations of the **National Curriculum Framework 2005 (NCF-2005)**.
- **Importance:**
  - **Introduction of Indigenous Toys and Games** segment in Kala Utsav 2020 supported the **'Vocal for Local'** initiative.
  - It is in **sync with the recommendations of National Education Policy 2020** which emphasises the promotion of arts and culture through education.
  - It **complements the Samagra Shiksha Scheme** by enhancing aesthetics and artistic experiences for **secondary-level students**, which play a major role in creating awareness of **India's rich cultural heritage** and its **vibrant diversity in line with 'Ek Bharat Shreshtha Bharat'**.
  - It enhances the **students' reasoning, comprehensibility, problem solving, cognitive and decisive abilities**, which are helpful in the **all-round development** of the student.
- **Other Initiatives Taken for Promoting Arts:**
  - **Kala Sanskriti Vikas Yojana** (Ministry of Culture).
  - **Scheme for Safeguarding the Intangible Cultural Heritage** (Ministry of Culture).



Note:



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# Economic Scenario

## Highlights

- Missed Annual Disinvestment Targets
- World Economic Outlook: IMF
- SC Upholds Validity of IBC Amendment Act, 2020
- Indian Railway Finance Corporation: IPO
- Bad Bank
- Davos Dialogue: World Economic Forum
- Gold Schemes in India
- Investment Trends Monitor Report: UNCTAD
- Green Bonds
- 24<sup>th</sup> Hunar Haat
- Shadow Entrepreneurs
- North East Venture Fund
- Government's Disinvestment Plans
- K-Shaped Economic Recovery
- India's Trade Deficit with China at Five-year Low in 2020
- Domestic Systemically Important Banks
- 4-Tier Structure for Regulation of NBFCs
- Digital Copyright Payments
- Decriminalisation of Offences Under LLP Act
- Transit Oriented Development
- 4<sup>th</sup> Edition of Future Investment Initiative Forum

## Missed Annual Disinvestment Targets

### Why in News

The government has raised less than 3% of budgeted revenues from disinvestment in 2020-21. As a result, the fiscal deficit for the current year is set to worsen.

- The government describes fiscal deficit of India as “the excess of total disbursements from the Consolidated Fund of India, excluding repayment of the debt, over total receipts into the Fund (excluding the debt receipts) during a financial year”.

### Key Points

- **Disinvestment Targets for 2020-21:**
  - Presenting the Union Budget of 2020, the Finance Minister had announced a **disinvestment target of Rs 2.1 lakh crore**. Such ambitious targets were set to keep the fiscal deficit under check.
  - However, the total disinvestment receipts from disinvestment so far this year have amounted to **Rs. 17.9 thousand crore which is just around 3% of the targeted revenues**.
- **Reason for Low Revenues:**
  - Annual targets were set three to four times the usual targeted revenue from disinvestment.

- The **slow pace of sales of the public assets** marked for disinvestment.

- In the current year, all aspects of the government's functioning was severely impacted by the **Covid-19 pandemic**.

- It has been in trend that except in a few years, the **government has been unable to raise as much money as it wanted** at the start of the year from disinvestment.

### ➤ Meaning of Disinvestment:

- Disinvestment means sale or liquidation of assets by the government, usually Central and state public sector enterprises, projects, or other fixed assets.
- The **government undertakes disinvestment** to reduce the fiscal burden on the exchequer, or to raise money for meeting specific needs, such as to bridge the revenue shortfall from other regular sources.

- For e.g. the Union government invests in several **public sector undertakings** (PSUs) such as Air India, Bharat Petroleum, Delhi Metro Rail Corporation etc.

- Since it is the majority shareholder (meaning that it owns more than 51% of the shares), the Centre can raise money through the liquidation of its shareholding in these PSUs.

### ➤ Types of Disinvestment Methods:

Note:



**DISINVESTMENT TARGETS, RARELY ACHIEVED**

YEAR	DISINVESTMENT TARGET (BE, Rs CRORE)	ACTUAL DISINVESTMENT RECEIPTS (Rs CRORE)	ACTUALS AS A PROPORTION OF BE (%)
2006-2007	3840	0	0.00
2007-2008	41651	3392	8.14
2008-2009	1165	2	0.17
2009-2010	1120	4306	384.46
2010-2011	40000	22275	55.69
2011-2012	40000	1145	2.86
2012-2013	30000	2193	7.31
2013-2014	40000	1589	3.97
2014-2015	43425	222	0.51
2015-2016	41000	12853	31.35
2016-2017	36000	21433	59.54
2017-2018	100000	100195	100.20
2018-2019	80000	85045	106.31
2019-2020	105000	50304	47.91
2020-2021*	210000	17957.7	

Data for all years except 2020-21 from the website of the Controller General of Accounts (CGA).  
Data for the current year from the Ministry of Finance

- **Minority Disinvestment:** This type of disinvestment in PSUs is such that, at the end of it, if the government of **India retains a majority stake (typically more than 51%)** in the company, it ensures management control.
    - For e.g. Reduced government's share in Life Insurance Corporation in 2020.
  - **Majority Disinvestment:** When disinvestment in PSUs is such that, at the end of it, the **government of India retains a minority stake** in the company i.e. it sells off a majority stake.
  - **Complete Disinvestment or Privatization:** It is a form of majority disinvestment wherein **100% control of the company is passed on to a buyer** i.e. government of India completely disinvests from that PSU.
    - Like Bharat Aluminium Company, which was sold to the Vedanta group in 2001.
- **Reasons Behind Disinvesting in PSUs.**
- Improving the overall efficiency of their functioning.
  - **Insulating them from political considerations** overshadowing economic and corporate interests.
    - Especially when PSU transacts with the government — for example when it sells its products and services to the government, the pricing may be influenced by factors other than market factors.
  - To make such a PSU more efficient as it would not be accountable to people and entities other than the government.
  - Private or corporate ownership could result in more efficient management.

- Plugging budget deficits i.e. filling the gap between its expenditures and tax revenues.
- Making more money available for other sectors like infrastructure and welfare schemes.

➤ **Changed Perspective about Disinvestment:**

- Before economic liberalisation, such efforts to monetise government's assets were criticised as selling the family silver.
- But post-liberalisation, reducing government stake, especially in sectors such as the strategic sectors like defence where government presence is not necessary, disinvestment is welcomed.

➤ **Nodal Agency for Disinvestment:**

- **Department of Investment and Public Asset Management (DIPAM)** under the Ministry of Finance is tasked with managing the Centre's investments in the PSUs.
  - Sale of the Centre's assets falls within the mandate of DIPAM.

**World Economic Outlook: IMF****Why in News**

Recently, the latest **World Economic Outlook** of the **International Monetary Fund (IMF)** has estimated that India's **Gross Domestic Product (GDP)** will grow by **11.5%** in the **Financial Year (FY) 2021-22**.

**Key Points**➤ **India Specific Projections:**

- **FY 2020-21:** For the current fiscal, the IMF had forecast a record **10.3% contraction**.
- **FY 2021-22:** For the next fiscal, starting from April 1<sup>st</sup>, GDP growth projection is at **11.5%**, 2.7% higher than the projection made in October, 2020.
  - Last October, the IMF had projected an 8.8% real GDP growth for India in **FY 2021-22**, highest globally.

- **FY 2022-23:** In FY 2022-23, the economy will likely grow **6.8%**.

➤ **Governments Projection for 2020-21:**

- The latest revision for the current fiscal is

**GDP growth**

(Estimates/Projections : In %)

Agencies	2020-21	2021-22
IMF	(-) 8.0	11.5
FITCH	(-) 9.4	11
OECD	(-) 9.9	8
UBS	(-) 7.5	11
S&P	(-) 7.7	10

Note:



higher than the **government's first advance estimate of 7.7%** and also the **RBI's estimate of 7.5%**.

➤ **Reason for Increase in the Estimates by IMF:**

- India has taken very decisive action, very decisive steps to deal with the **pandemic** and to deal with the economic consequences of it.

➤ **Government Measures to Deal With the Pandemic:**

- **Reserve Bank of India's Covid19 Economic Relief Package**
- **Pradhan Mantri Garib Kalyan Yojana:** The government announced Rs 1.70 lakh crore relief package under the newly framed **Pradhan Mantri Garib Kalyan Yojana** for the poor to help them fight the battle against covid-19.
- **Atmanirbhar Bharat Abhiyan** (or Self-reliant India Mission): The Self-Reliant India Mission **aims towards cutting down import dependence** by focussing on substitution while improving safety compliance and quality goods to gain global market share.
  - Government announced **liquidity measures for businesses, especially Micro, Small and Medium enterprises (MSMEs)** under the Atmanirbhar Bharat Abhiyan.

➤ **Global Projections:**

○ **Global Economy:**

- The global economy is projected to grow **5.5% in 2021 and 4.2% in 2022.**
  - The IMF also saw a narrower 3.5% contraction in world output in 2020 as opposed to a 4.4% decline seen earlier.
- It attributed the 0.3% point upward revision for 2021 to **"expectations of a vaccine-powered strengthening** of activity later in the year and additional **policy support** in a few large economies.

○ **Global Trade Volumes:**

- They are forecasted to grow about **8% in 2021.**
- The IMF expects **oil prices to rise** in 2021 by just over 20% from the low base for 2020 but they will still remain well below their average for 2019.
- **Non-oil commodity prices are also expected to increase** with those of metals, in particular, projected to accelerate strongly in 2021.

Nation	OVERVIEW OF WORLD ECONOMIC OUTLOOK PROJECTIONS	
	YEAR-OVER-YEAR (% CHANGE)	
	PROJECTIONS	
	2021	2022
The United States	5.1	2.5
Germany	3.5	3.1
The UK	4.5	5.0
China	8.1	5.6
India*	11.5	6.8

\*For India, data and forecasts are presented on a fiscal year basis and GDP from 2011 onward is based on GDP at market prices with fiscal year 2011/12 as a base year; source: IMF

○ **Other Economies with High percentage of Growth:**

- **China** would grow 8.1% in 2021, followed by **Spain** (5.9%) and **France** (5.5 %).
- China, which was the only major country to register a growth rate of 2.3 % in 2020, will expand 5.6% in 2022.

○ **Increased Inequality:**

- The report highlighted the **pandemic-induced acceleration in inequality** by reiterating that close to **90 million people are likely to fall below the extreme poverty threshold during 2020-21** as workers with less education, women, youth, those in contact-intensive sectors, and those informally employed suffer disproportionate livelihood and income losses.
- The **pandemic is expected to reverse the progress** made in poverty reduction across the past two decades.
- It can be noted that recently, the **Inequality Virus Report**, released by **Oxfam International**, has also found that the **Covid pandemic deeply increased the existing inequalities in India and around the world.**

**International Monetary Fund**

- The IMF was set up along with the **World Bank** after the **Second World War** to assist in the reconstruction of war-ravaged countries.
  - The two organisations were agreed to be set up at a conference in Bretton Woods in the US. Hence, they are known as the **Bretton Woods twins.**
- Created in **1945**, the IMF is governed by and accountable to the **189 countries** that make up its near-global membership. India joined on December 27, 1945.
- The IMF's **primary purpose is to ensure the stability of the international monetary system**—the system of exchange rates and international payments that enables countries (and their citizens) to transact with each other.
  - The Fund's **mandate** was updated in 2012 to **include all macroeconomic and financial sector issues that bear on global stability.**
- **Other Reports by IMF:**
  - **Global Financial Stability Report**

Note:



## SC Upholds Validity of IBC Amendment Act, 2020

### Why in News

Recently, the **Supreme Court (SC)** has upheld the constitutional validity of the **Insolvency and Bankruptcy Code (IBC) (Amendment) Act, 2020**.

### Key Points

#### ➤ Background:

- In its August 2019 order, the SC had **upheld the government decision to grant home-buyers the status of financial creditors**.
  - **Financial creditor:** It means any person to whom a 'financial debt' is owed and includes a person to whom such debt has been legally assigned or transferred to.
- Subsequently, the **government introduced the IBC (Amendment) Act, 2020**, that **mandated a threshold of at least 10% of home-buyers (or allottees) in a project or 100 of the total allottees** for initiating insolvency proceedings against the real estate developer.
  - It means that a **single home-buyer is barred from approaching the National Company Law Tribunal (NCLT)** under Section 7 of the IBC to initiate insolvency proceedings against the real estate developer/builder.
  - Section 3 of the Amendment Act allows **home-buyers to seek the Corporate Insolvency Resolution Process (CIRP)** against builders **only when 100 allottees or at least 10% of allottees** make a joint application to NCLT.
    - The **allottees should be from the same real estate project**. Aggrieved allottees drawn from different projects of the same developer cannot form the 100.
  - A **30-day deadline** was given for existing applicants to find the requisite number of supporters to meet the threshold of 100, **else their plea pending in the tribunal even before the commencement of the 2020 Act would be deemed as withdrawn**.
- This was **done to prevent real estate projects from being stalled by few disappointed home-buyers/investors**.

#### ➤ SC's Ruling:

##### ○ Threshold:

- SC said that insisting on a threshold in regard to these categories of creditors would **stop indiscriminate litigation**.
- The court agreed with the legislature that **having a single allottee approach the tribunal would be risky**, considering that a corporate insolvency resolution may also entail a complete overhaul or replacement of the developer's company management.
  - Such an initiative by a lone allottee would **derail the plans of other allottees**, who still had faith in the existing developer or were pursuing other legal remedies.
- The amendment reflects an attempt at **shielding corporate debtors (Real Estate Developers) from what it considers would be either for frivolous or avoidable applications**.

##### ○ Consensus of Creditors:

- The amendment is likely to ensure that the filing of the application is preceded by a **consensus at least by a minuscule percentage of similarly placed creditors**.

##### ○ Allotment:

- It does not matter whether a person has one or more allotments in his name or in the name of his family members.
- **As long as there are independent allotments made to him or his family members, all of them would qualify as separate allottees and they would count both in the calculation of the total allotments**, as also in reckoning the figure of hundred allottees or one-tenth of the allottees.

### Insolvency and Bankruptcy Code

#### ➤ Enactment:

- The IBC was enacted in **2016**.

#### ➤ Objective:

- To **streamline and speed up the resolution process** of failed businesses.
- To **consolidate provisions of the existing legislative framework** to form a common forum for debtors and creditors of all classes to resolve insolvency.
- To stipulate that the resolution process of a stressed company will have to be completed in a maximum of **270 days**.

Note:



- **Threshold Amount for Invoking Insolvency:**
  - In March 2020, the government raised the threshold for invoking insolvency under the IBC to **Rs. 1 crore from Rs. 1 lakh** with a view to prevent triggering of such proceedings against small and medium enterprises that are facing the heat of the Covid-19 pandemic.
- **Institutions to Facilitate Resolution of Insolvency:**
  - **Insolvency Professionals:**
    - These professionals **administer the resolution process, manage the assets of the debtor, and provide information for creditors to assist them in decision making.**
  - **Insolvency Professional Agencies:**
    - The agencies **conduct examinations to certify the insolvency professionals** and enforce a code of conduct for their performance.
  - **Information Utilities:**
    - Creditors will report financial information of the debt owed to them by the debtor. Such information will include records of debt, liabilities and defaults.
  - **Adjudicating Authorities:**
    - The proceedings of the resolution process is **adjudicated by the NCLT**, for companies; and the **Debt Recovery Tribunal (DRT)**, for individuals.
    - The duties of the authorities will include **approval to initiate the resolution process, appoint the insolvency professional, and approve the final decision of creditors.**
  - **Insolvency and Bankruptcy Board:**
    - The Board **regulates insolvency professionals, insolvency professional agencies and information utilities** set up under the Code.
    - The Board consists of representatives of the **Reserve Bank of India**, and the Ministries of Finance, Corporate Affairs and Law.

**Note:**

- **Insolvency:** It is a situation where individuals or companies are unable to repay their outstanding debt.
- **Bankruptcy:** It is a situation whereby a court of competent jurisdiction has declared a person or other entity insolvent, having passed appropriate orders to resolve it and protect the rights of the creditors. It is a legal declaration of one's inability to pay off debts.

## Indian Railway Finance Corporation: IPO

### Why in News

The **Initial Public Offering (IPO)** of **Indian Railway Finance Corporation (IRFC)** got 65% subscription on the first day of bidding.

- Earlier, **Indian Railway Catering and Tourism Corporation Ltd. held an IPO** on the National Stock Exchange in 2019.

### Key Points

- **First Issue:**
  - It is the **first IPO in the calendar year 2021** and the **first public issue by a railway non-banking financial company.**
- **Amount Raised:**
  - Through the initial public offer, **the Centre, the promoter of IRFC, will offload 13.6 % stake in the company.**
  - At the higher price band of Rs 26 per share, **the government would raise Rs 3,243 crore** and the company will have a market cap of Rs 23,845 crore.
- **Objective:**
  - IRFC will use the IPO proceeds from the fresh issue to **boost its capital base and general corporate purposes.**
- **Other Government Interventions to Enhance Railway's Efficiency:**
  - **Development of freight corridors**
  - **High-speed railway**
  - **Elevated corridors**

### Initial Public Offering (IPO)

- **About:**
  - IPO is the **selling of securities to the public in the primary market.**
    - **Primary market deals with new securities** being issued for the first time. It is also known as the **new issues market.**
    - It is different from the **secondary market** where **existing securities are bought and sold.** It is also known as the stock market or **stock exchange.**

Note:

### Indian Railway Finance Corporation

#### ➤ About:

- A **subsidiary of the Indian Railways**, it is the **dedicated market borrowing arm** of the Indian Railways.

#### ➤ Established:

- It was **incorporated in 1986**.

#### ➤ Finance Model:

- It follows a **financial leasing model** to finance the acquisition of rolling stock assets, which includes locomotives, coaches, wagons, trucks, flats, electric multiple units, containers, cranes, trollies, etc.

##### ● Finance Leasing Model:

- Deriving revenues through the leasing model typically **involves three parties: the seller, the buyer (lessee) and the financier (lessor)**.
- In exchange for payment, **ownership of an item** (usually equipment) is **transferred from the seller to the lessor**.
- The **lessee then contracts with the lessor for the use of the item in exchange for a periodic fee**.
- The seller may or may not retake ownership of the item once the leasing contract has ended.

#### ➤ Contribution:

- It plays a **significant role in supporting the capacity enhancement of the Indian Railways** by financing the majority proportion of their annual plan outlay which gives a long term business visibility, the brokerage feels.

#### ➤ Other Functions:

- It is also into **leasing railway infrastructure assets and national projects of the Government of India (project assets) and lending to other entities** under the Ministry of Railways (MoR).

- It is **when an unlisted company makes either a fresh issue of securities or an offer for sale** of its existing securities or both for the first time to the public.
  - **Unlisted companies** are companies that are not listed on the stock exchange.
- It is generally **used by new and medium-sized firms that are looking for funds to grow and expand their business**.

#### ➤ Benefits:

- The funds raised by IPO allows the company to **invest in new capital equipment and infrastructure**.
- An IPO paves way for **listing and trading of the issuer's securities on the Stock exchange market**.
- The IPO also allows the company to **attract top talent** because it **can offer stock options to its employees**. This enables the company to **pay its executives fairly low wages initially**. And later, in return, the employees as promised can cash out with the IPO.

## Bad Bank

### Why in News

Recently, the **Reserve Bank of India (RBI)** Governor has agreed to look at a proposal for creating a **Bad Bank**.

### Key Points

#### ➤ About:

- A bad bank conveys the impression that it will **function as a bank but has bad assets to start with**.
- Technically, a **bad bank is an Asset Reconstruction Company (ARC)** or an Asset Management Company(AMC) that **takes over the bad loans of commercial banks, manages them and finally recovers the money** over a period of time.
- The bad bank is not involved in lending and taking deposits, but **helps commercial banks clean up their balance sheets and resolve bad loans**.
  - The **takeover of bad loans is normally below the book value** of the loan and the bad bank tries to recover as much as possible subsequently.
- US-based Mellon Bank created the **first bad bank in 1988**, after which the concept has been implemented in other countries including Sweden, Finland, France and Germany.
  - The **Troubled Asset Relief Programme (TARP)** in the US.
  - In Ireland, the **National Asset Management Agency** was established in 2009 to respond to the financial crisis.

#### ➤ Need in India:

- **Economic Recovery:**

Note:



- With the **pandemic** hitting the banking sector, the RBI fears a spike in bad loans in the wake of a six-month moratorium it has announced to tackle the economic slowdown.
- **Government Support:**
  - Professionally-run bad banks, funded by the private lenders and supported by the government, can be an effective mechanism to deal with **Non-Performing Assets(NPA)**.
  - The **presence of the government** is seen as a means to **speed up the clean-up process**.
- **Rising NPAs:**
  - **Financial Stability Report (FSR):** The RBI noted in its recent **FSR** that the gross NPAs of the banking sector are expected to shoot up to 13.5% of advances by September 2021, from 7.5% in September 2020.
  - **K V Kamath Committee:** Noted that corporate sector debt worth Rs 15.52 lakh crore has come under stress after **Covid-19** hit India, while another Rs 22.20 lakh crore was already under stress before the pandemic.
    - The committee noted that **companies in sectors such as retail trade, wholesale trade, roads and textiles are facing stress**.
    - Sectors that have been under **stress pre-Covid include Non-Banking Financial Company (NBFC), power, steel, real estate and construction**.
  - **International Precedents:** Many other countries had set up institutional mechanisms to deal with a problem of stress in the financial system.

#### ➤ **Challenges:**

- **Mobilising Capital:**



- Finding buyers for bad assets in a pandemic hit economy will be a challenge, especially when **governments are facing the issue of containing the fiscal deficit**.
- **Not Addressing the Underlying Issue:**
  - Without governance reforms, the **Public sector banks** (accounted for 86%, of the total NPAs) may go on doing business the way they have been doing in the past and **may end up piling-up of bad debts again**.
  - Also, the bad bank idea is like **shifting loans from one government pocket (the public sector banks) to another (the bad bank)**.
- **Provisioning Issue Tackled Through Recapitalization:**
  - Union Government, in the last few years, has **infused nearly Rs 2.6 lakh crore** in banks through **recapitalisation**.
  - Those who oppose the concept of bad banks hold that the government has on its part recapitalised the banks to compensate for the write-offs and hence, there is no need for a bad bank.
- **Market-related Issues:**
  - The price at which bad assets are transferred from commercial banks to the bad bank will not be market-determined and **price discovery will not happen**.
- **Moral Hazard:**
  - Former RBI Governor Raghuram Rajan had said that a bad bank may create a moral hazard and **enable banks to continue reckless lending practices, without any commitment to reduce NPAs**.

#### ➤ **Previous Proposals:**

- **In May 2020** the banking sector, led by the **Indian Banks' Association**, had submitted a proposal for setting up a bad bank to resolve the NPA problem, proposing equity contribution from the government and banks.
- **In 2017** the **Economic Survey** suggested **Public Sector Asset Rehabilitation Agency or PARA**, to buy out the NPAs of high value from Indian banks.

## **Davos Dialogue: World Economic Forum**

### **Why in News**

Recently, the Prime Minister addressed the **World**

Note:





**Economic Forum's (WEF) Davos Dialogue** via video conferencing.

- The WEF annual meeting in Davos (Switzerland) engages the world's top leaders to **shape global, regional and industry agendas**.
- The Davos Dialogues agenda marks the launch of the WEF's **Great Reset Initiative** in the post Covid world.



### The Great Reset Initiative of WEF

#### ➤ About:

- It is based on the assessment that the world economy is in deep trouble.
  - Situation has been made a lot worse by many factors, including the **pandemic's devastating effects on global society**, the **un-folding technological revolution**, and the **consequences of climate change**.

#### ➤ Agenda:

- The world must act jointly and swiftly to revamp all aspects of our societies and economies, from education to social contracts and working conditions. Every country must participate, and every industry, from oil and gas to tech, must be transformed.
- In short there should be a **'Great Reset' of capitalism**.

### Key Points

#### ➤ India's Fight Against Covid:

- India, took a **proactive public participation approach** and developed a Covid-specific health infrastructure and trained its resources to fight Covid.
- India, which is the home to the world's 18% population, has not only taken care of its citizens but also **helped other countries by exporting PPE kits and masks**.

- India guided the world how traditional medicine (**Ayurveda**) could help in **improving immunity**.
- India has **developed two coronavirus vaccines** so far which have been **exported to other countries** and the world would see many more Made in India vaccines in the coming days.

#### ➤ Indian Economy During the Pandemic:

- India has maintained economic activity by starting infrastructure projects worth billions of rupees and initiating **special schemes for employment such as:**
  - **Garib Kalyan Rojgar Abhiyaan:** The scheme empowered and provided livelihood opportunities to the returnee migrant workers and rural citizens who have returned to their home states due to the **Covid-19** induced **lockdown**.
- India's ambition of self-reliance (**Aatmanirbhar Bharat**) will strengthen globalism and will help in **Industrial revolution 4.0**.
  - India is working on all the four factors of Industrial revolution 4.0 which are **connectivity, automation, artificial intelligence or machine learning and real-time data**.

#### ➤ India's Digital Infrastructure:

- Growing **digital infrastructure** has made digital solutions everyday part of life in India.
  - It has made public service delivery efficient and transparent.
    - 1.3 billion Indians have universal ID- **Aadhar** which is connected to their account and phone.
    - In December 2020, there has been 4 trillion rupees worth of transactions through **Unified Payments Interface (UPI)**.
    - India **could transfer 1.8 trillion rupees worth of assistance through direct benefit transfer** to the accounts of 760 million Indians during the pandemic.
- India has started a campaign named **National Digital Health Mission** for providing easy access to health care by giving **Unique Health ID** to its citizens.
  - **National Digital Health Mission:** It is a complete digital health ecosystem. The digital platform will be launched with four key features — **health ID**, personal health records, Digi Doctor and health facility registry.

Note:

- India's vision is to transform the country through access, inclusion and empowerment while **ensuring the privacy of the user.**
- **Indian Policies Support Global Business:**
  - India's **Aatamirbhar Bharat** movement is committed to global good and global supply chain as **India has capacity, capability and reliability to strengthen global supply chain.**
    - Its **massive consumer base** will further grow and help the global economy.
    - India invited the global players to take advantage of the 26 billion dollar **Production Linked Incentive (PLI) scheme.**
  - India offers **ease of doing business** as there is a predictable and friendly environment from tax regime to **Foreign Direct Investment** norms, one such example of an Indian initiative is **Foreign Investment Facilitation Portal.**
    - **Foreign Investment Facilitation Portal (FIFP)** is the online single point interface of the Government of India with investors to facilitate FDI. It is administered by the **Department for Promotion of Industry and Internal Trade, Ministry of Commerce and Industry.**
- **India and Climate Change:**
  - India is matching its growth with the goals of **climate change.**
    - Few Indian Initiatives to Fight Climate Change:
      - **National Clean Air Programme (NCAP):** It is a five-year action plan with a tentative target of 20-30% reduction in concentrations of PM10 and PM2.5 by 2024, with 2017 as the base year.
      - India has also shifted from **Bharat Stage-IV (BS-IV) to Bharat Stage-VI (BS-VI) emission norms** from 1<sup>st</sup> April 2020 which was earlier to be adopted by 2024.
      - It has distributed more than 360 million LED bulbs under the **UJALA scheme**, which has led to energy saving of about 47 billion units of electricity per year and reduction of 38 million tonnes of CO<sub>2</sub> per year.
  - India is focussing on sustainable **urbanization** with focus on ease of living, ease of doing business and climate sensitive development.

### World Economic Forum

- **About:**
  - The World Economic Forum (WEF) is a **Swiss nonprofit foundation established in 1971**, based in **Geneva, Switzerland.**
  - Recognized by the Swiss authorities as the international institution for **public-private cooperation.**
- **Mission:**
  - Committed to improving the state of the world by engaging business, political, academic, and other leaders of society to shape global, regional, and industry agendas.
- **Founder and Executive Chairman:** Klaus Schwab.
- **Some major reports published by WEF are:**
  - **Energy Transition Index**
  - **Global Competitiveness Report**
  - **Global IT Report**
    - WEF along with INSEAD, and Cornell University publishes this report.
  - **Global Gender Gap Report**
  - **Global Risk Report**
  - **Global Travel and Tourism Report**

## Gold Schemes in India

### Why in News

The government is planning to bring **changes in the existing gold deposit and gold metal loan schemes** to gradually **stop investors from excessive investment in physical gold.**

### Key Points

- **Background:**
  - **Despite the government's emphasis on gold monetisation** over the last few years, **including issuing gold bonds** as part of its borrowing programmes, **investment in physical gold and purchases of jewellery** continues to outpace investment through financial channels.
- **Government's Plan:**
  - A **number of amendments** have been finalised in the existing revamped **Gold Deposit Scheme**, revamped **Gold Metal Loan Scheme** and **India Gold Coin Scheme.**

Note:

- The existing scheme will be made far from **attractive from investment convenience and taxation aspects**.

### Gold Schemes

#### ➤ Gold Monetisation Scheme (GMS):

- **GMS**, which **modified the then existing 'Gold Deposit Scheme' (GDS) and 'Gold Metal Loan Scheme (GML)**, was launched in 2015 to mobilise gold held by households and institutions of the country and facilitate its use for productive purposes, and in the long run, to reduce country's reliance on the import of gold.

#### ➤ Revamped Gold Deposit Scheme (R-GDS):

- **Deposit limit:** The minimum deposit at any one time shall be **raw gold** (bars, coins, jewellery excluding stones and other metals) **equivalent to 30 grams of gold**. **There is no maximum limit** for deposit under the scheme.
  - **Proposed Changes in the existing scheme:** The minimum requirement of **30 grams could be reduced to 1 gram**. Interest earnings and capital gains under the scheme **will continue to be exempt from capital gains tax, wealth tax and income tax**.
- **Time period:**
  - The designated banks can accept gold deposits under the **Short Term** (1-3 years) Bank Deposit (STBD) as well as **medium** (5-7 years) and **long** (12-15 years) term government deposit schemes.
- **Implementing agency:**
  - All **scheduled commercial banks** are allowed to implement this scheme and are also free to fix interest rates.
- **Premature Withdrawal:**
  - Depositors can also make premature withdrawal of their deposits. It will be subject to a minimum lock-in period and penalty to be determined by individual banks.
- **Associated Issue:**
  - **Cultural issue:** For long, Indians have been closely associated with gold. Getting them to part with their gold, especially when it is in jewellery form, is very difficult.
    - Under the scheme, the depositor has to make clear in the beginning whether he/she wants to redeem it in cash or in gold. Even if it is in gold, the banks will return them in

standardised gold bars, that is likely to meet with a lot of reluctance.

- **Returns on gold:** Banks pay interests on the deposited gold. These interests, rather than encouraging individuals to part with the gold they already hold, **encourages more entities to import large quantities of gold and deposit them with Indian banks as the returns will be high**. If that happens, then the entire purpose of the Gold Monetisation Scheme is negated.

#### ➤ Revamped Gold Metal Loan Scheme (GML):

- It is a mechanism under which a **jewellery manufacturer borrows gold metal instead of rupees** and settles the GML with the sale proceeds obtained.
- GML can be availed for **180 days in case of domestic jewellery manufacturers and for 270 days in case of exports**.
  - Amendments are also being planned in the GML scheme.
  - **Issue of Liquidity:** According to the Scheme, the banks can lend or sell gold to jewellers or other banks that are part of the Scheme.
    - However, a cash deposit can be given to anybody. But a gold deposit can only go to those looking specifically for gold.
    - Thus, there is a chance of banks finding it difficult to **match gold borrowers with gold depositors**.
    - That means there could be a situation where banks don't have enough interest accruing to them to cater to the interest they have to pay gold depositors.
- **Sovereign Gold Bond Scheme:**
  - **Aim:** **It seeks to encourage** people to buy gold bonds instead of actual gold.
  - **Issuer:** **The Reserve Bank of India** (RBI) issues these bonds on behalf of the central government.
  - **Features:**
    - The gold bonds will be denominated in multiples of gram (s) of gold with a basic unit of one gram while the **minimum investment limit is two grams**.
    - The **maximum subscription is 500 grams** per person per fiscal (April-March) and for joint holders, the limit will be applied on the first holder.

Note:

- The gold bonds **will be sold only to** resident Indian entities including individuals, Hindu undivided families, trusts, universities, and charitable institutions.
- The **bond tenure is eight years with exit option** beginning the fifth year onwards. They will also be **tradable**.
- These bonds **can also be used as collateral for loans**.
- **Associated Issue (Discourages rupee bond):** The price of gold **internationally is linked to the dollar**. The new gold bonds, if made attractive enough, could become a **substitute to rupee bonds**.
  - Indians will start putting their money into a type of dollar bond rather than rupee bonds. This might exert an upward pressure on interest rates.
- **The Gold Coin and Bullion Scheme:**
  - The government **issues gold coins**, which have the Ashok Chakra engraved on them.

## Investment Trends Monitor Report: UNCTAD

### Why in News

According to the recent **Investment Trends Monitor Report** issued by the **United Nations Conference on Trade and Development (UNCTAD)**, global **Foreign Direct Investment (FDI)** collapsed in 2020 by 42% to an estimated USD 859 billion from USD 1.5 trillion in 2019.

- Such a low level was **last seen in the 1990s** and is more than 30% below the investment decline that followed the **2008-2009 global financial crisis**.

### Key Points

- **Global Trend:**
  - **India and China:**
    - India witnessed a 13% year-on-year rise, the **highest among key nations**, in FDI inflows in 2020, China's rose by 4%.
    - In absolute terms, **China remained way ahead, with an inflow of as much as \$163 billion**, while **India's stood at \$57 billion**.
  - **Advanced Economies:**
    - The UK and Italy saw an over 100% crash each in FDI inflows, followed by **Russia (96% drop)**,

**Germany (61%), Brazil (50%), the US (49%), Australia (46%) and France (39%).**

- **Developing Economies:**

- Developing economies drew as much as **72% of global FDI** in 2020 – their highest share on record.
- **Asian nations** did particularly well, **attracting USD 476 billion** in FDI in 2020.

- **Future Projection:**

- The uncertainty about the **Covid-19** evolution **will continue to hamper global FDI inflows in 2021**, threatening sustainable recovery prospects.

- **Reason for the Rise in FDI in India:** Inflows into **digital sector**.

- **India's Measures to Increase FDI:**

- In 2020, schemes like **production-linked incentive (PLI) scheme for electronics manufacturing**, have been notified to attract foreign investments.
- In 2019, the Central Government **amended FDI Policy 2017**, to permit **100% FDI under automatic route in coal mining activities**.
- Further, the **government permitted 26% FDI in digital sectors**.
  - The sector has particularly high return capabilities in India as favourable demographics, substantial mobile and internet penetration, massive consumption along with technology uptake provides great market opportunity for a foreign investor.
- FDI in manufacturing was already under the 100% automatic route, however **in 2019, the government clarified that investments in Indian entities engaged in contract manufacturing is also permitted under the 100% automatic route** provided it is undertaken through a legitimate contract.
  - **Contract Manufacturing:** Production of goods by one firm, under the label or brand of another firm.
- **Foreign Investment Facilitation Portal (FIFP):**
  - It is the online single point interface of the Government of India with investors to facilitate FDI. It is administered by the Department for Promotion of Industry and Internal Trade, Ministry of Commerce and Industry.

### Foreign Direct Investment

Note:



- **About:**
  - FDI is an **investment made by a firm or individual in one country into business interests located in another country.**
  - The key feature of foreign direct investment is that **it establishes either effective control of, or at least substantial influence over, the decision-making of a foreign business.**
    - This makes it **different from portfolio investments** in which an investor merely purchases equities of foreign-based companies.
- **Importance:**
  - FDI is important because it **gives countries access to external capital, technology, market access and tax contributions.**
- **Types:** FDI are commonly categorized as being horizontal, vertical or conglomerate.
  - **Horizontal:**
    - A horizontal direct investment refers to the **investor establishing the same type of business operation** in a foreign country as it operates in its home country.
  - **Vertical:**
    - A vertical investment is one in which **different but related business activities from the investor's main business are established** or acquired in a foreign country, such as when a manufacturing company acquires an interest in a foreign company that supplies parts or raw materials required for the manufacturing company to make its products.
  - **Conglomerate:**
    - A conglomerate type of foreign direct investment is one where a **company or individual makes a foreign investment in a business that is unrelated to its existing business** in its home country.
    - Since this type of investment involves entering an industry the investor has no previous experience in, it often takes the form of a joint venture with a foreign company already operating in the industry.
- **Components:** FDI has three components, viz., **equity capital, reinvested earnings and intra-company loans.**
  - **Equity Capital:**
    - It is the foreign direct investor's **purchase of shares of an enterprise** in a country other than its own.

- **Reinvested Earnings:**
  - Comprise the **direct investors' share** (in proportion to direct equity participation) of earnings not distributed as dividends by affiliates, or earnings not remitted to the direct investor.
  - Such retained profits by affiliates are reinvested.
- **Intra-company loans or intra-company debt transactions:**
  - Refer to **short- or long-term borrowing and lending of funds** between direct investors (or enterprises) and affiliate enterprises.
- **Routes:** Routes through which India gets FDI:
  - **Automatic Route:** In this, the foreign entity **does not require the prior approval of the government.**
  - **Government route:** In this, the foreign entity has to **take the approval of the government.**

### United Nations Conference on Trade and Development (UNCTAD)

- **Establishment:**
  - UNCTAD is a permanent intergovernmental body established in 1964.
- **Headquarter:**
  - It is a permanent intergovernmental body headquartered at Geneva in Switzerland.
- **Objective:**
  - It promotes development-friendly integration of developing countries into the world economy.
- **Reports Published:**
  - **Trade and Development Report**
  - **World Investment Report**
  - The Least Developed Countries Report
  - Information and Economy Report
  - Technology and Innovation Report
  - Commodities and Development Report

## Green Bonds

### Why in News

As per a recent study by the **Reserve Bank of India (RBI)**, the **cost of issuing green bonds has generally remained higher than other bonds in India**, largely due to asymmetric information.

Note:

### Key Points

#### ➤ Green Bonds (Description):

##### ○ About:

- A green bond is a **debt instrument** with which **capital is being raised to fund 'green' projects**, which typically include those relating to renewable energy, clean transportation, sustainable water management etc.
  - A bond is a **fixed income instrument** that represents a loan made by an investor to a borrower (typically corporate or governmental).
  - Bonds **traditionally paid a fixed interest rate (coupon)** to investors.

##### ○ Growth:

- In 2007, green bonds were **launched by few development banks** such as the European Investment Bank and the **World Bank**. Subsequently, in 2013, corporates too started participating, which led to its overall growth.

##### ○ Regulation:

- The **Securities and Exchange Board of India (SEBI)** has put in place **disclosure norms** for issuance and listing of green bonds.

##### ○ Benefits:

- **Enhances Reputation:**
  - Green bonds enhance an **issuer's reputation**, as it helps in showcasing their commitment towards **sustainable development**.
- **Fulfillment of Commitments:**
  - Ability to meet commitments, for signatories to climate agreements and other green commitments.
  - India's **Intended Nationally Determined Contribution (INDC)** document puts forth the stated targets for India's contribution towards climate improvement and following a low carbon path to progress.
- **Raised at Lower Costs:**
  - Green bonds typically **carry a lower interest rate** than the loans offered by the commercial banks.
  - With an increasing focus of foreign investors towards green investments, it could help in reducing the cost of raising capital.

##### ● Sunrise Sectors:

- These green bonds have been crucial in **increasing financing to sunrise sectors** like renewable energy, thus contributing to India's sustainable growth.

#### ➤ Details of RBI's Recent Study:

##### ○ Current Share:

- Green bonds constituted only **0.7%** of all the bonds issued in India **since 2018**.
  - However, **bank lending to the non-conventional energy** (renewable energy) constituted about **7.9%** of outstanding bank credit to the power sector, as of March 2020.
- Most of the green bonds in India **are issued by the public sector units or corporates** with better financial health.

##### ○ Challenges:

##### ● High Coupon Rate:

- The average coupon rate for green bonds issued since 2015 with maturities between 5 to 10 years have generally **remained higher than the corporate government bonds** with similar tenure.

##### ● High Borrowing Cost:

- It has been the **most important challenge due to the asymmetric information**. **High coupon rate is one of the reasons** for high borrowing cost.
- **Asymmetric information**, also known as "information failure," occurs when one party to an economic transaction possesses greater material knowledge than the other party.

##### ○ Suggestion:

- **Developing a better information management system** in India may help in reducing maturity mismatches, borrowing costs and lead to efficient resource allocation in this segment.

#### ➤ Other Challenges:

##### ○ Misuse of Funds:

- There have been serious debates about whether the projects targeted by green bond issuers are green enough because the proceeds of green bonds are being used to fund projects that harm the environment.

##### ○ Lack of Credit Ratings:

Note:

- Lack of credit rating or rating guidelines for green projects and bonds.
- **Shorter Tenor Period:**
  - Green bonds in India have a shorter tenor period of about 10 years whereas a typical loan would be for a minimum 13 years. Further Green Projects require more time to bring returns.

## 24<sup>th</sup> Hunar Haat

### Why in News

24<sup>th</sup> “Hunar Haat” is being organized in Lucknow (Uttar Pradesh) from 22<sup>nd</sup> January to 04<sup>th</sup> February, 2021.

### Key Points

- **About:**
  - **Hunar Haat** is an **exhibition of handicrafts and traditional products** made by artisans from the minority communities.
- **Theme:**
  - **Vocal for Local.**
- **Organizer:**
  - These are organised by the Ministry of Minority Affairs under **USTTAD (Upgrading the Skills & Training in Traditional Arts/Crafts for Development) scheme.**
    - The **USTTAD scheme** aims to promote and preserve the rich heritage of the traditional arts & crafts of the minority communities.
- **Aim:**
  - These Haat aims to **provide market exposure and employment opportunities to artisans, craftsmen and traditional culinary experts.**
  - It envisages **boosting the skills of craftsmen, weavers and artisans** who are already engaged in the traditional ancestral work.
- **Significance:**
  - ‘Hunar Haat’ has proved to be an **“Empowerment Exchange”** for master artisans and craftsmen.
  - It has proved to be **immensely beneficial and encouraging for artisans and craftsmen** as lakhs of people visit the “Hunar Haat” and purchase indigenous handmade products of artisans on large scale.
    - More than **5 lakh artisans, craftsmen and people associated** with them have been **provided**

**employment and employment opportunities in the last about 5 years through “Hunar Haat”.**

## Shadow Entrepreneurs

### Why in News

There has been a **global rise of shadow entrepreneurship**, in various sectors such as **education** (certificates), **finance** (for easy loans), **the betting economy** (online games) and **healthcare** (e-pharmacies).

### Key Points

- **About:**
  - **Shadow entrepreneurs** are individuals who manage a business that sells legitimate goods and services but they **do not register their businesses.**
  - This means that they **do not pay tax**, operating in a shadow economy where **business activities are performed outside the reach of government authorities.**
  - Types of businesses include **unlicensed taxicab services, roadside food stalls and small landscaping operations.**
  - In a study of 68 countries, the **Imperial College Business School** found that after Indonesia, India has the **second highest rate of shadow entrepreneurs.**
- **Causes for Rise in Shadow entrepreneurs:**
  - **Taxation & Enforcement:** **High tax rates** accompanied by **loose enforcement** induces **tax avoidance, discourage investment in formal businesses,** and drive entrepreneurial activity toward the informal sector.
  - **Impact of Covid-19:** Shadow entrepreneurs, offering **technology-mediated services,** bring complementary services that traditional service providers may be constrained to offer or consumers **might not be able to access** due to lockdown constraints.
  - **Technological Advancements:** Shadow entrepreneurship is also promoted through technology-enabled new markets and also entry of new and tech savvy consumers.
- **Benefits:**
  - Increase in employment: Most of Informal sector jobs come under shadow entrepreneurship.

Note:



- Driver of economic development
- Reduction in Poverty
- Removes pressure on agriculture by providing non agricultural jobs.
- Diversified options for consumers

➤ **Challenges of Shadow Entrepreneurs:**

- **Decrease Competitiveness:**
  - Small firms will get acquired by large firms. First movers in the space with deep pockets could generate irrationally high valuations.
- **Dubious & illegal:**
  - Recent events related to app-based loan providers who charge very high interest rates and dubious methods for recovery.
- **Economic Loss:**
  - Loss of revenue as these businesses are not registered with the government.
- **Corruption:**
  - They are beyond the reach of law making them vulnerable to corrupt officials.
- **Asset Size:**
  - Informal entrepreneurs tend to invest in their businesses much less intensively than the formal ones, which implies that formality is positively correlated with asset size.

➤ **Suggestions:**

- **Formalisation of Economy:** Where proper economic and political frameworks are in place, individuals are more likely to become 'formal' entrepreneurs and register their business, because doing so enables them to take advantage of laws and regulations that protect their company.
- **Monitoring:** Strong monitoring of quality would be essential. This needs to be complemented with **non-compliance being punishable with a jail term**, clamping down on services and related strict consequences.
- **Reward Compliance:** Those shadow firms that comply should be welcome to join the dominant mode of service delivery with non-shadow firms.
- **Coordination among Agencies:** There also needs to be better coordination **of activities between authorities of governments** (for example the Ministry of Corporate Affairs in regulating shadow entrepreneurship and government departments in healthcare, education or finance).

## North East Venture Fund

### Why in News

The Ministry of Development of North-East Region has recently **given an update on the scheme North East Venture Fund.**

### Key Points

➤ **About:**

- Set up by **North Eastern Development Finance Corporation Limited (NEDFi)** in association with the **Ministry of Development of North Eastern Region (M-DoNER)**, the **North East Venture Fund** scheme was launched in September 2017.
- It is the **first dedicated venture capital fund** for the North Eastern Region(NER).
  - Venture capital is a form of **private equity** and a type of **financing** that **investors provide to startup companies** and small businesses that are believed to have **long-term growth potential**. Venture capital generally comes from **well-off investors, investment banks and any other financial institutions.**

○ **Corpus Amount:**

- Capital commitment of **Rs 100 crore.**

○ **Objectives:**

- To contribute to the **entrepreneurship development of the NER** and achieve **attractive risk-adjusted returns through long term capital appreciation** by way of investments in privately negotiated equity/ equity related investments.
- The fund targets to invest in Start-Ups and unique business opportunities to provide resources for new entrepreneurship in Food Processing, Healthcare, Tourism, segregation of services, IT, etc.

○ **Range of funds:**

- The investment under this scheme ranges from **Rs. 25 lakh to Rs.10 crore per venture**, which is long term in nature with an investment horizon of **4-5 years.**

### Other Initiatives for the Development of North-Eastern Region

- **North East Rural Livelihood Project (NELRP):**

Note:





- Launched in 2012, the **NERLP** is a **World Bank** aided, multi-state project under the Ministry of Development of North Eastern Region (DoNER).
- The project has been implemented in **11 districts of Mizoram, Nagaland, Tripura and Sikkim** with an aim to **improve rural livelihoods especially that of women, unemployed youth and the most disadvantaged**, in the four North Eastern States.
- **North Eastern Region Vision 2020 document** provides an overarching framework for the development of the North Eastern Region.
- **Science & Technology Interventions in the North East Region (STINER):**
  - STINER aims to bring **relevant technologies developed by the academic, scientific and research institutions to the artisans and farmers especially women**.
- **North Eastern Region Power System Improvement Project (NERPSIP):**
  - **The Scheme** was initially approved in December 2014 as a **Central Sector Scheme** of the Ministry of Power.
  - It aims to create a reliable **power grid** and improve NER States' connectivity to the upcoming load centers, and thus extend the benefits of the **grid connected power to all categories of consumers of beneficiaries in the North Eastern Region**.
- **Destination North East festival:**
  - The different facets of Northeast including the entrepreneurship avenues are replicated at **different locations across the country**. During these events also, an exclusive arrangement is made for offering counselling and assistance to potential entrepreneurs and business Start-Ups.

## Government's Disinvestment Plans

### Why in News

Recently, the Ministry of Finance has extended the bidding deadlines for the strategic **disinvestment** of **Pawan Hans** by a month, citing logistical challenges faced by interested bidders due to the **Covid-19 pandemic**.

- Pawan Hans Limited is a **helicopter service company** based in New Delhi. It is a **Mini Ratna-I** category Public Sector Undertaking.

### Key Points

#### ➤ Background:

- **Government's Disinvestment Target for 2020-2021:** Government **plans to raise Rs. 2.1 lakh crore** through disinvestment in 2020-21, with just about **Rs. 14,000 crore raised** so far through minority stake sales.
- **New Public Sector Policy:** As part of the '**Aatmanirbhar Bharat Abhiyan**' package, the government in May 2020 had announced that there will be a maximum of four public sector companies in the strategic sectors, and state-owned firms in other segments will eventually be privatised.
  - Under the policy, **a list of strategic sectors will be notified** where there will be **at least one and a maximum of four public sector enterprises**, apart from private sector companies.
  - In other sectors, **central public sector enterprises (CPSEs) will be privatised**, depending on the feasibility.

#### ➤ Current Situation:

- The **Bidding deadline** for the disinvestment of **Pawan Hans** has been **extended by a month**.
- Strategic sales of public sector firms like **Air India** and **Bharat Petroleum Corporation Limited (BPCL)** are unlikely to conclude this year.
- Further amendments are needed to the LIC Act of 1986 to list the **Life Insurance Corporation of India** on the markets.

#### ➤ Need for Disinvestment Proceeds:

- There is a pressure on the government to raise resources to **support the economic recovery** and meet expectations of higher outlays for healthcare.
- The increase in public **spending in the upcoming Budget** will have to be financed to a large extent by garnering disinvestment proceeds and monetising assets.
- To **eliminate the need for the government's involvement in non-strategic areas**.

### Disinvestment

- Disinvestment means **sale or liquidation of assets by the government**, usually Central and state public sector enterprises, projects, or other fixed assets.
- **The government undertakes disinvestment** to **reduce the fiscal burden** on the exchequer, or **to raise money**

Note:



for meeting specific needs, such as to bridge the revenue shortfall from other regular sources.

- **Strategic disinvestment** is the transfer of the ownership and control of a public sector entity to some other entity (mostly to a private sector entity).
  - Unlike the simple disinvestment, strategic sale implies a kind of privatization.
- The **disinvestment commission defines strategic sale as the sale of a substantial portion of the Government shareholding of a central public sector enterprises (CPSE) of upto 50%**, or such higher percentage as the competent authority may determine, along with transfer of management control.
- The **Department of Investment and Public Asset Management (DIPAM)** under the Ministry of Finance is the nodal department for the strategic stake sale in the Public Sector Undertakings (PSUs).
- Strategic disinvestment in India has been guided by the basic economic principle that the **government should not be in the business to engage itself in manufacturing/producing goods and services in sectors where competitive markets have come of age.**
  - The economic potential of such entities may be better discovered in the hands of the strategic investors due to various factors, e.g. **infusion of capital, technology up-gradation and efficient management practices etc.**

## K-Shaped Economic Recovery

### Why in News

Recently, the latest readings of the **Nomura India Normalization Index (NINI)** suggested the impact of **Covid-19** on Indian Economy and the **K-Shaped Recovery** through which the Indian Economy is recovering.

- **Nomura Services India Private Limited** (Nomura Holdings Inc) is a consumer services company.

### Key Points

- **Findings:**
  - **Effect of Covid-19 on Households:**
    - Households at the top of the pyramid are likely to have seen their incomes largely protected, and savings rates forced up during the lockdown, increasing 'fuel in the tank' to drive future consumption.

- Households at the bottom are likely to have witnessed permanent hits to jobs and incomes.
- **Effect of the Current Monetary Policy:**
  - A long lasting period of **ultra-accommodative monetary policy** has led to a fall in real lending rates and spreads for corporates and households that should eventually come as lagged relief to the interest-sensitive sectors.
    - An **economic spread** is a measure of a company's ability to make money on its capital investments.
- **Impact of Vaccination:**
  - Lagging sectors such as travel, tourism and hospitality will finally emerge out of the effect of **Covid-19.**
- **Economic Recovery after Covid-19:**
  - As the **fiscal deficit** in FY 2020-21 has widened to roughly 7% of GDP, which is double the pre-pandemic target of 3.5 % of GDP. The government may, therefore, feel encouraged to **rely on higher fuel taxes, disinvestment, and sin taxes to bolster coffers.**
  - India is going through a **K-shaped recovery**, wherein corporates and households with stronger balance sheets have recovered more robustly, while smaller firms and poorer households probably remain **trapped in a vicious cycle of poverty and indebtedness** instigated by the **pandemic.**

### Economic Recovery

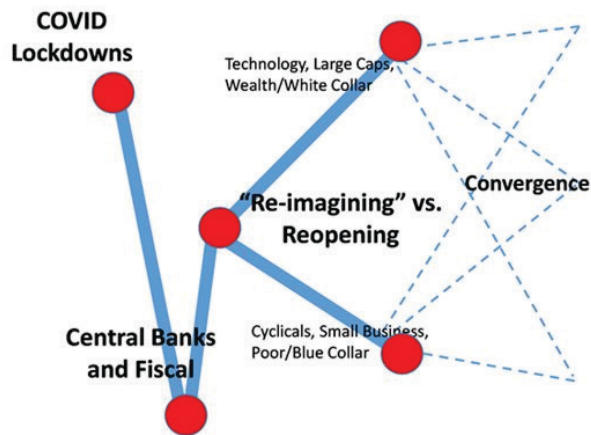
- **About:**
  - It is the **business cycle stage** following a **recession** that is characterized by a sustained period of improving business activity.
  - Normally, during an economic recovery, **GDP** grows, incomes rise, and unemployment falls and as the economy rebounds.
- **Types:**
  - Economic recovery can take many forms, which is depicted using alphabetic notations. For example, a **Z-shaped recovery, V-shaped recovery, U-shaped recovery, elongated U-shaped recovery, W-shaped recovery, L-shaped recovery** and **K-shaped recovery.**
- **K-Shaped Recovery:**
  - A K-shaped recovery occurs when, following a recession, **different parts of the economy recover**

Note:



at different rates, times, or magnitudes. This is in contrast to an even, uniform recovery across sectors, industries, or groups of people.

- A K-shaped recovery leads to changes in the structure of the economy or the broader society as economic outcomes and relations are fundamentally changed before and after the recession.
- This type of recovery is called K-shaped because the path of different parts of the economy when charted together may diverge, resembling the two arms of the Roman letter "K."



- **Implications of a K-Shaped Recovery after Covid:**
  - Households at the bottom have experienced a permanent loss of income in the forms of jobs and wage cuts, this will be a recurring drag on demand, if the labour market does not heal faster.
  - To the extent that Covid has triggered an effective income transfer from the poor to the rich, this will be demand-impeding because the poor have a higher marginal propensity to consume (i.e. they tend to spend-instead of saving) a much higher proportion of their income.
  - If Covid-19 reduces competition or increases the inequality of incomes and opportunities, it could impinge on trend growth in developing economies by hurting productivity and tightening political economy constraints.

## India's Trade Deficit with China at Five-year Low in 2020

### Why in News

The trade deficit, between India and China, declined

to a five year-low of 45.8 billion USD in 2020, the lowest since 2015.

- **Trade Deficit:** A trade deficit is an amount by which the cost of a country's imports exceeds its exports.

### Key Points

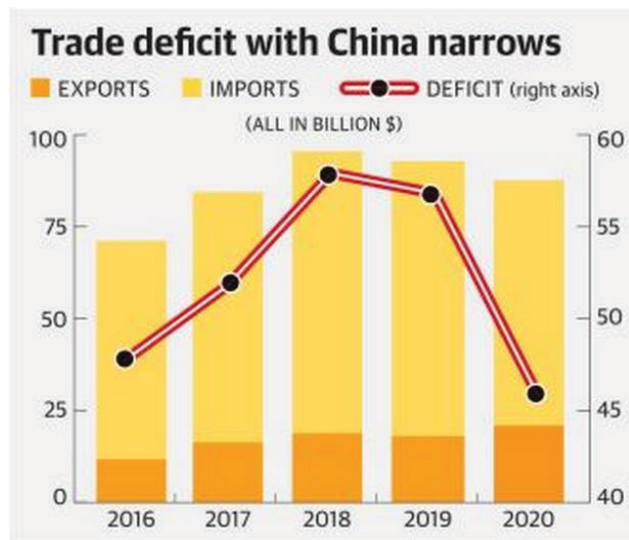
- **Bilateral Trade in 2020:** Two-way trade in 2020 reached 87.6 billion USD, down by 5.6% from 2019, according to new figures from China's General Administration of Customs (GAC).
  - India's imports from China accounted for 66.7 billion USD, declining by 10.8% year-on-year and the lowest figure since 2016.
  - India's exports to China, however, rose to the highest figure on record, crossing the 20 billion USD mark and growing 16% in 2020.
- **Analysis:**
  - India's overall imports declined, due to slump in domestic demand in 2020.
  - There is, yet, no evidence to suggest India has replaced its import dependence on China by either sourcing those goods elsewhere or manufacturing them at home.
- **India's Biggest Import from China (2019 data):**
  - Electrical machinery and equipment, organic chemicals fertilisers etc.
- **India's Top Exports to China (2019 data):**
  - Iron ore, organic chemicals, cotton and unfinished diamonds.
  - Further, the year 2020 saw a surge in demand for iron ore in China with a slew of new infrastructure projects aimed at reviving growth after the Covid-19 slump.
- **Trade Deficit with China:**
  - The balance of trade between India and China is hugely tilted in the favour of the latter. India's trade deficit with China was 45.8 billion USD in 2020 and 56.77 billion USD in 2019.
  - The huge trade deficit with China could be attributed to two factors: narrow basket of commodities, mostly primary, that India exports to China and market access impediments for most of Indian agricultural products and the sectors where India is competitive in, such as pharmaceuticals, IT/IteS, etc.
  - Over time, India's raw material-based commodities have been overshadowed by Chinese exports of

Note:

machinery, power-related equipment, telecom, organic chemicals and fertilisers.

➤ **Measures Taken to Reduce Import Dependence on China:**

- The **ban on more than 100 Chinese apps**, amidst **border tensions** between the two countries in eastern Ladakh.
- It has increased scrutiny of **Chinese investments in many sectors**, and is weighing a decision to keep Chinese companies out of **5G trials**.
- The government recently put **import restrictions on tyres**, while also making its **prior approval mandatory for foreign investments from countries that share land border** with India to curb “opportunistic takeovers” of domestic firms - a move which will **restrict FDI from China**.
- The Ministry of Commerce and Industry has **also identified 12 sectors** - food processing, organic farming, iron, aluminium and copper, agro chemicals, electronics, industrial machinery, furniture, leather and shoes, auto parts, textiles, and coveralls, masks, sanitisers and ventilators - to make India a global supplier and cut import bill.
- To **cut import dependency on China for APIs** (Active Pharmaceutical Ingredients), the government in March **approved a package** comprising four schemes with a total outlay of Rs. 13,760 crore to boost domestic production of bulk drugs and medical devices in the country along with their exports.



## Domestic Systemically Important Banks

### Why in News

The **Reserve Bank of India (RBI)** has retained **State Bank of India, ICICI Bank and HDFC Bank** as **Domestic Systemically Important Banks (D-SIBs)** or banks that are considered as “too big to fail”.

### Key Points

- **Systemically Important Banks (SIBs):**
  - **Some banks**, due to their **size, cross-jurisdictional activities, complexity, lack of substitutability and interconnectedness**, become **systemically important**.
  - SIBs are perceived as banks that are ‘**Too Big To Fail (TBTF)**’. This perception of TBTF creates an **expectation of government support for these banks** at the time of distress.
    - SIBs are **subjected to additional policy measures** to deal with the **systemic risks and moral hazard** issues posed by them.
    - **Systemic risk** can be defined as the risk associated with the collapse or failure of a company, industry, financial institution or an entire economy.
    - **Moral hazard** is a situation in which one party gets involved in a risky event knowing that it is protected against the risk and the other party will incur the cost.
  - The disorderly failure of these banks has the **potential to cause significant disruption to the essential services** they provide to the banking system, and in turn, to the **overall economic activity**.
- **Background:**
  - **G-SIBs:** The **Financial Stability Board (FSB)**, in consultation with the **Basel Committee on Banking Supervision (BCBS)** and national authorities, has **identified Global Systemically Important Banks (G-SIBs)** since 2011.
    - **Financial Stability Board (FSB)** is an international body that monitors and makes recommendations about the global financial system. It was established in 2009. **India is a member**.
    - **BCBS** publishes the **methodology** for assessing and identifying G-SIBs.

Note:

- **BCBS** is the primary global standard setter for the prudential regulation of banks. **RBI** is its member.
- **G-SIIs**: The **FSB**, in consultation with the **International Association of Insurance Supervisors (IAIS)** and national authorities, began identifying **Global Systemically Important Insurers (G-SIIs)** in 2013.
- **IAIS**, established in 1994, is a **voluntary membership organization** of insurance supervisors and regulators from more than 200 jurisdictions, constituting 97% of the world's insurance premiums.
  - **Insurance Regulatory and Development Authority of India (IRDAI)** and the **International Financial Services Centres Authority (IFSCRA)** are its members.
- **Domestic Systemically Important Banks (D-SIBs)**:
  - The **BCBS** finalized its framework for dealing with **D-SIBs** in October 2012. The D-SIB framework **focuses on the impact that the distress or failure of banks will have on the domestic economy**.
  - As opposed to the G-SIB framework, D-SIB framework is **based on the assessment conducted by the national authorities**, who are best placed to evaluate the impact of failure on the local financial system and the local economy.
  - The **RBI** had **issued the framework for dealing with D-SIB in 2014**. The D-SIB framework **requires the Reserve Bank to disclose the names of banks designated as D-SIBs** starting from 2015 and place these banks in appropriate buckets depending upon their Systemic Importance Scores (SISs).
  - The **indicators** which are **used for assessment** are: **size, interconnectedness, substitutability and complexity**.
  - Based on their systemic importance scores in ascending order, banks are plotted into **four different buckets** and are required to have **additional Common Equity Tier 1 Capital (CET1)** requirements ranging from **0.20% to 0.80% of risk weighted assets (RWA)**.
    - **CET1** is the highest quality of regulatory capital, as it absorbs losses immediately when they occur. It is a **capital measure introduced in 2014** globally as a precautionary means to protect the economy from a financial crisis.

- **RWA**, are used to link the minimum amount of capital that banks must have, with the risk profile of the bank's lending activities (and other assets).
- In case a **foreign bank** having branch presence in India is a **Global Systemically Important Bank (G-SIB)**, it has to maintain **additional CET1 capital surcharge** in India as applicable to it as a G-SIB, proportionate to its Risk Weighted Assets (RWAs) in India.

#### Domestic Systemically Important Insurers

- The **Life Insurance Corporation of India (LIC)**, **General Insurance Corporation of India** and **The New India Assurance Co** have been identified as **Domestic Systemically Important Insurers (D-SIIs)** for 2020-21 by **Insurance Regulatory and Development Authority of India (IRDAI)**.
- **D-SIIs** refer to insurers of such size, market importance and domestic and global interconnectedness whose distress or failure would cause a significant dislocation in the domestic financial system.
- **IRDAI, just like the banking regulator RBI did to identify such "too big to fail" banks and NBFCs**, had endeavored to identify such companies in the insurance business in the March of 2019, in the **aftermath of the collapse of IL&FS** which triggered a massive liquidity crisis in the financial markets.
- The **International Association of Insurance Supervisors (IAIS)** has also asked all member countries to have a regulatory framework to deal with Domestic-SIIs.

## 4-Tier Structure for Regulation of NBFCs

### Why in News

- Recently, the **Reserve Bank of India (RBI)** has proposed a tighter regulatory framework for **Non-Banking Financial Companies (NBFCs)** by creating a **four-tier structure** with a progressive **increase in intensity of regulation**.
- It has also proposed classification of **Non-Performing Assets (NPAs)** of base layer NBFCs from 180 days to 90 days overdue.
  - Earlier in 2020 the RBI announced a host of measures to provide **liquidity support to NBFCs**.

Note:





**Note:**

- The **Department of Non-Banking Supervision (DNBS) of RBI is entrusted with the responsibility of regulation and supervision of NBFCs** under the regulatory - provisions contained under Chapter III B and C and Chapter V of the **Reserve Bank of India Act, 1934**.
- The Regulatory and Supervisory Framework of the Reserve Bank provides for, among other things, **registration of NBFCs, prudential regulation of various categories of NBFC, issue of directions on acceptance of deposits by NBFCs and surveillance of the sector through off-site and on-site supervision**.
- Deposit taking NBFCs and Systemically Important Non-Deposit Accepting Companies are **subjected to a greater degree of regulation and supervision**.
- The focus of regulation and supervision is three fold, viz., **a) depositor protection, b) consumer protection and c) financial stability**.
- The **RBI has also been empowered under the RBI Act 1934 to take punitive action** which includes cancellation of Certificate of Registration, issue of prohibitory orders from accepting deposits, filing criminal cases or winding up petitions under provisions of Companies Act in extreme cases.

**Key Points**

- **Aim:**
  - The proposed framework is aimed at **protecting financial stability** while ensuring that smaller NBFCs continue to enjoy light regulations and grow with ease.
- **Proposed Classification of NBFC (The Four-Tier Structure):** The regulatory and supervisory framework of NBFCs should be based on a four-layered structure:
  - **Base Layer:**
    - NBFCs in the lower layer will be known as NBFC-Base Layer (NBFC-BL).
    - For NBFCs in this layer **least regulatory intervention is warranted**.
  - **Middle Layer:**
    - NBFCs in the middle layer will be known as NBFC-Middle Layer (NBFC-ML)
    - The regulatory regime for this layer will be **stricter compared to the base layer**.
    - **Adverse regulatory arbitrage vis-à-vis banks** can be addressed for NBFCs falling in this layer

in order to **reduce systemic risk spill-overs, where required**.

- **Upper Layer:**
  - NBFC in the Upper Layer will be known as NBFC-Upper Layer (**NBFC-UL**) and will invite a **new regulatory superstructure**.
  - This layer will be populated by **NBFCs which have large potential of systemic spill-over of risks and have the ability to impact financial stability**.
  - There is no parallel for this layer at present, as this will be a **new layer for regulation**. The regulatory framework for NBFCs falling in this layer will be **bank-like**, albeit with suitable and appropriate modifications.
  - If an identified NBFC-UL does not meet the criteria for classification for four consecutive years, it will move out of the enhanced regulatory framework.
- **Top Layer:**
  - Ideally this layer is supposed to be empty.
  - It is possible that supervisory judgment might push some NBFCs out of the upper layer of the systemically significant NBFCs for higher regulation/supervision.
  - These NBFCs will occupy the top of the upper layer as a distinct set.
  - If certain NBFCs lying in the upper layer are seen to pose extreme risks as per supervisory judgement, they can be put to higher and bespoke regulatory/supervisory requirements.

**Non-Banking Financial Company**➤ **About:**

- A Non-Banking Financial Company (NBFC) is a company **registered under the Companies Act, 1956** engaged in the business of loans and advances, acquisition of shares/stocks/bonds/debentures/securities issued by Government or local authority or other marketable securities of a like nature, leasing, hire-purchase, insurance business, chit business **but does not include** any institution whose principal business is that of agriculture activity, industrial activity, purchase or sale of any goods (other than securities) or providing any services and sale/purchase/construction of immovable property.

Note:



- A non-banking institution which is a company and has **principal business of receiving deposits under any scheme or arrangement** in one lump sum or in installments by way of contributions or in any other manner, is also a non-banking financial company (**Residuary non-banking company**).

➤ **Features of NBFCs:**

- NBFC **cannot accept demand deposits**.
- NBFCs **do not form part of the payment and settlement system and cannot issue cheques drawn on itself**.
- Deposit insurance facility of Deposit Insurance and Credit Guarantee Corporation is not available to depositors of NBFCs.

## Digital Copyright Payments

### Why in News

Recently, **Google** has signed a deal with a group of **French publishers** to make **digital copyright payments** for online news content.

- A **similar tussle is ongoing between the Australian government and global tech platforms** (google and facebook) **over the sharing of royalties with news publishers**.

### Key Points

➤ **About the Google-French Deal:**

- **France became the first country** to enshrine the **European Union** copyright rules into national law. This brought into effect '**neighbouring rights**' law.
  - **Neighbouring Rights:** According to the **World Intellectual Property Organization (WIPO)**, neighboring rights protect the legal interests of **certain persons and legal entities** that contribute to **making works available to the public** or that produce subject matter which, while not qualifying as works under the copyright systems of all countries, contains sufficient creativity or technical and organizational skill to justify recognition of a copyright-like property right.
- The newly adopted EU directive **ensures that media are paid for original content**, typically news, offered online by tech giants such as Google and Facebook.

- Under the new law, **Google was forced to negotiate to pay** the publishers and news agencies for reusing their material online.

➤ **European Union Copyright Rules:**

- It **wants to create a comprehensive framework** where copyrighted material, copyright holders, publishers, providers and users can all benefit from clearer rules, **adapted to the digital era**. The focus is on **three main objectives**:
  - **Wider opportunities** to use copyrighted material for education, research and preservation of cultural heritage.
  - **More cross-border and online access** for citizens to copyright-protected content.
  - **Fairer rules** for a better-functioning of copyright marketplace which stimulate creation of high-quality content.

➤ **Issues in Australia:**

- Google has **threatened to remove its search engine** from the country, and Facebook has said it could **block Australian users** from posting or sharing news links **if proposed norms on royalty payments are rolled out**.
    - **Royalty payment:** A royalty is a **legally-binding payment** made to an individual, for the ongoing use of his or her originally-created assets, including copyrighted works, franchises, and natural resources.
  - The **argument made by the global tech companies** is that:
    - The Australian media industry is already benefiting from traffic being routed to them by each of the digital platforms.
    - The new rules proposed by the Australian authorities would expose them to unmanageable levels of financial and operational risk.
    - Hefty fines proposed by authorities are being seen as an added disincentive.
  - The **fundamental difference** in the approach taken by the French and Australian authorities on the issue is that **France specifically linked payments to copyright, without putting a forcing device into the agreements like in Australia**.
- **Significance for India:**
- Digital technologies have transformed the way creative content is produced, distributed and accessed.

Note:



- The new EU Directive and ongoing Copyright royalty tussle in Australia brings to light the **need for updating the copyright rules across the world including India** to sync **policies and laws** to enable Digital copyright payments for its content creators too.
- According to a FICCI-EY report, in India's media and entertainment sector for 2020, there are **300 million users of online news sites**, portals and aggregators in the country.
  - With **282 million unique visitors**, India is the **world's second largest** online news consuming nation after China.
- **Draft Copyright (Amendment Rules), 2019** is a positive step in securing interests of Indian content creators and users.
  - **Existing Copyright Laws in India:**
    - The copyright regime in India is governed by the **Copyright Act, 1957** and the Copyright Rules, 2013.
    - **The Copyright Rules, 2013** were last amended in 2016 through the **Copyright Amendment Rules, 2016**.

### **Draft Copyright (Amendment Rules), 2019**

- **Agency involved:** It was released by the **Department for Promotion of Industry and Internal Trade (DPIIT)**.
- **Objective:** The amendments are being brought in to **bring the Copyright Act on par with other relevant legislations** and to ensure it is in sync with the technological advancements in the current digital era.
- **Proposals in Draft Rules:**
  - **Setting up an Appellate Board:**
    - Setting up an **Appellate Board** to replace the Copyright Board.
    - The Chairman and other members of the Board will be appointed as per the provisions of the **Trade Marks Act, 1999**.
  - **Fixing Tariff Schemes:**
    - It also proposes to amend the manner in which **copyright societies** fix their tariff schemes.
  - **Copyright Society:** It is a legal body which protects or safeguards the interest of owners of the work by giving assurance to the creative authors of the commercial management of their works.

- These societies issue licences and collect royalties in accordance with a tariff scheme.
- DPIIT has proposed in the amendments that when fixing its tariff the copyright society may consider, **“cross-sectional tariff comparisons, economic research, the nature and scope of the use of the work, the commercial value of the rights in use and the benefits to licensees”**.
- The amendments propose to make it mandatory for copyright societies to publish “the annual transparency” report for each financial year on its Website.

## **Decriminalisation of Offences Under LLP Act**

### **Why in News**

Recently, the **Company Law Committee (CLC)** has recommended that 12 offences under the **Limited Liability Partnership (LLP) Act 2008** be decriminalised and that LLPs be allowed to issue **Non-Convertible Debentures (NCDs)** to raise funds with the aim of improving ease of doing business for LLP firms.

- The **Company Law Committee (CLC)** was set up by the **Ministry of Corporate Affairs** in September, 2019 to promote Ease of Living in the country by providing **Ease of Doing Business** to law-abiding corporates and fostering improved corporate compliance for stakeholders at large.

### **Key Points**

- **Company Law Committee's (CLC's) Recommendations:**
  - **Decriminalisation of Offences:**
    - Several offences related to **timely filings**, including **annual reports and filings on changes in partnership status of the LLP**, not related to fraud have been recommended for decriminalisation.
    - While **none of these provisions** recommended for decriminalisation currently **have prison terms** as a possible punishment, the committee has **recommended that companies be required to pay penalties for non-compliance, instead of fines which are imposed after a partner or the LLP is found guilty of misconduct by a court.**

Note:

- **Risk Involved in Imposing Fines:**
  - The Committee has noted that there is a **risk of a convicted person being disqualified or becoming ineligible for various posts** in the case of fines imposed by courts, which would not be the case for penalties imposed by an appropriate authority.
- **Authority to Levy Penalties:**
  - The **Registrar of Companies (ROC)** would have the authority to levy penalties for any contravention of provisions of the LLP Act.
  - ROC **appointed under Section 609 of the Companies Act** covering the various States and Union Territories are **vested with the primary duty of registering companies and LLPs** floated in the respective states and the Union Territories.
- **Permission to Issue NCDs:**
  - LLPs which are currently not allowed to issue debt securities should be permitted to issue NCDs **to facilitate raising of capital and financing operations.**
- **Beneficiaries:**
  - The move is likely to benefit **startups and small firms** in sectors which require heavy capital investment.

### Limited Liability Partnership

- **About:**
  - It is a partnership in which some or all partners (depending on the jurisdiction) **have limited liabilities.**
  - In an LLP, **each partner is not responsible or liable for another partner's misconduct or negligence.**
  - The LLP can **continue its existence irrespective of changes in partners.** It is capable of entering into contracts and holding property in its own name.
  - The LLP is a **separate legal entity**, is liable to the full extent of its assets but liability of the partners is limited to their agreed contribution in the LLP.
- **LLP vs Traditional Partnership Firm:**
  - Under "traditional partnership firm", every partner is liable, jointly with all the other partners and also severally for all acts of the firm done while he is a partner.
  - Under LLP structure, liability of the partner is limited to his agreed contribution. Thus, individual partners are shielded from joint liability created by another partner's wrongful acts or misconduct.

### ➤ **LLP vs a Company:**

- The internal governance structure of a company is regulated by statute (i.e. **Companies Act, 2013**) whereas for an LLP it would be by a contractual agreement between partners.
- The **management-ownership divide** inherent in a company is not there in a limited liability partnership.
- LLP will have more **flexibility** as compared to a company.
- LLP will have lesser **compliance** requirements as compared to a company.

### **Non-Convertible Debentures**

- Debentures are **long-term financial instruments** that are issued by companies to borrow money.
- Some debentures have a **feature of convertibility into shares** after a certain point of time at the discretion of the debenture holder.
- The **debentures which cannot be converted into shares** are called Non-Convertible Debentures (or NCDs).
- There are **two types of NCDs**-secured and unsecured.
  - **Secured:** A secured NCD is backed by the assets of the company. If the company fails to pay the obligation, the investor holding the debenture can claim that through liquidation of those assets.
  - **Unsecured:** Contrary to secured NCD, there is no backing in unsecured NCDs if the company defaults.

## Transit Oriented Development

### *Why in News*

The **redevelopment of New Delhi Railway Station (NDLS)** has become the first project to be undertaken on the **Transit-Oriented Development (TOD) concept in the NCR.**

### *Key Points*

- **Approving Authority:** The project has been approved by the **Rail Land Development Authority (RLDA)** which is a **statutory body** under the **Ministry of Railways** responsible for the development of vacant railway land.
  - Currently, the Indian Railways has approximately 43,000 hectares of vacant land across the country.

Note:



- The Government, in recent times, has been promoting '**transit-oriented development**' where public transport is the backbone of cities.

➤ **About:**

- **Transit-Oriented Development (TOD)** integrates land use and transport planning and aims to develop planned sustainable urban growth centers, having walkable and livable communes with high density mixed land-use.

➤ **Plan of TOD:**

- A TOD typically includes a **central transit stop** (such as a train station, or light rail or bus stop) surrounded by a **high-density mixed-use area**, with **lower-density areas spreading out from this center**.
- A TOD is also typically designed to be **more walkable** than other built-up areas, through using smaller block sizes and reducing the land area dedicated to automobiles.



➤ **Need of TOD:**

- Factors such as **rapidly growing population, Urbanization, migration to cities, and traffic congestion** etc.

➤ **Benefits:**

- Higher quality of life with better places to live, work, and play, greater mobility with ease of moving around, reduced traffic congestion, car accidents and injuries, reduced household spending on transportation, resulting in more affordable housing etc.

➤ **TOD & Policy Initiatives in India:** It is based on three pillars:

○ **Enable Transformation (From Private to Public Transportation):**

- To assist in transformation of cities from private vehicle dependent city to public transport oriented development

○ **Accessible Public Transport (Promote Green Mobility):**

- To promote the usage of public transport by making it accessible, encourage green mobility by encouraging people to walk and cycle and at the same time curb pollution and other negative impacts of motorization.

○ **Compact Walkable Communities:**

- To create livable and affordable communities, which are compact and walkable.

➤ **Objectives of TOD Policy:**

○ **Public Transport:**

- To promote the use of public transport and reduction in private owned vehicles by developing high density zones in the influence area, which would increase the share of transit and walk trips and also result in **reduction in pollution and congestion** in the influence area.

○ **Reduction in Travel:**

- To provide all the basic needs of work/ job, shopping, public amenities, entertainment in the influence zone with mixed land-use development which would reduce the need for travel.

○ **Road Network:**

- To establish a dense road network within the development area for safe and easy movement.

○ **Inclusivity:**

- To **develop inclusive habitat** in the influence area so that the people dependent on public transport can live in the livable communities within the walkable distance of transit stations.

- To integrate the **Economically Weaker Sections (EWS) and affordable housing** in the influence zone by allocating a prescribed proportion of built-up area for them in the total housing supply.

○ **Safety to Vulnerable Section:**

- To ensure development of a safe society with special attention to safety of women, children, senior citizens and differently abled by making necessary amendments to the building bye laws.

Note:



- **Planned Urbanization:**
  - To prevent urban sprawl by accommodating the growing population in a compact area with access to the transit corridor, which would also consolidate investments and bring down the infrastructure cost for development.
- **Climate Friendly:**
  - To reduce carbon footprints by shifting towards environmentally friendly travel options for the line haul as well as for access and egress trips.

## 4<sup>th</sup> Edition of Future Investment Initiative Forum

### Why in News

The Union Minister of Health and Family Welfare addressed the 4<sup>th</sup> edition of the Future Investment Initiative Forum through a video conference.

- The aim of the Forum **hosted in Riyadh (Saudi Arabia)** was to find solutions on how businesses and governments can expand access to healthcare, train healthcare workers, remove regulatory barriers and encourage investment in advanced health technologies.

#### Future Investment Initiative Forum

- The Future Investment Initiative (FII) is widely described as “**Davos in the desert**”. It is **Saudi Arabia’s flagship investment conference**.
  - The **informal name derives from the World Economic Forum’s annual meeting** that is held in Davos, Switzerland, where world leaders discuss agendas for pressing international issues.
- FII was announced in **September 2017** by the **Public Investment Fund**, Saudi Arabia’s main sovereign wealth fund, in the context of the **Saudi Vision 2030 Economic and Social Reform Programme**.



### Key Points

- **India Highlighted Five Big Trends Emerging Due to Covid-19 and Impacting Global Business:**

- **The impact of Technology and Innovation.**
- **Importance of Infrastructure** for Global Growth.
- **Changes coming in human resource** and future of work.
- Compassion for **Environment**.
- **Business friendly Governance** with focus on the whole of society and government approach.
- **India’s Initiatives Highlighted:**
  - **Indigenous Innovations to Digital Health Tools (for Covid-19):**
    - **Aarogya Setu App: Bluetooth tracking technology** is used to analyze and locate Covid hotspots and alert local authorities in advance.
  - **For Strengthening Infrastructure:**
    - India has launched a special economic and comprehensive package of **Rs. 2 million Crore**, equivalent to **10%** of India’s GDP under **Atmanirbhar Bharat Abhiyan**.
  - **For Human Resource:**
    - India has developed a comprehensive vision on developing skilled human resources. For Ex., Recently, the government has launched the **Pradhan Mantri Kaushal Vikas Yojana (PMKVY) 3.0**.
  - **For Environment:**
    - The steps taken by India to mitigate climate change (e.g. **National Action Plan on Climate Change**) and move towards clean fuel consumption (e.g. **Ujjwala**).
  - **For Business Friendly Governance:**
    - India is developing a comprehensive ecosystem from research and development to **tech-entrepreneurship**.
- **Emphasized Healthcare:**
  - India demonstrated the **world’s largest vaccination campaign** launched by it recently with **two Covid-19 vaccines (Covidshield and Covaxin)**.
  - Serum Institute of India will deliver **Covishield to Saudi Arabia**.
  - Referred to the development of the **Co-WIN digital platform** and the **Ayushman Bharat scheme**, the world’s largest government health program, which are shining examples of the use of technology in the integration of public health communities.



Note:



# International Relations

## Highlights

- *Russia Pulls Out of Open Skies Treaty*
- *Chinese Incursions in Taiwan*
- *West Asia Peace Conference*
- *GI Tag for Pakistani Basmati*
- *China's New Villages in Arunachal Pradesh*
- *India's Vaccine Diplomacy*
- *India- Sri Lanka*
- *50 Years of India-Bangladesh Relations*
- *5<sup>th</sup> India – Singapore Defence Ministers' Dialogue*
- *Kashmir Debate in UK's Parliament*
- *India & Oman*
- *47<sup>th</sup> G7 Summit*
- *Egypt Resumes Severed Relations With Qatar*
- *India-Nepal Joint Commission Meet*
- *Russia Agrees to Extend START Treaty*
- *Agreement With IEA*

## Russia Pulls Out Of Open Skies Treaty

### Why in News

Recently, Russia pulled out of the **Open Skies Treaty (OST)** citing earlier withdrawal of the USA from the treaty.

- According to Russia, provisions of the pact that allows unarmed surveillance flights over member countries had been seriously compromised by the withdrawal of the United States.
- This move was made after the **USA pulled out of the Open Skies Treaty** in November 2020, arguing that Russian violations made it untenable for the United States to remain a party.

### Note:

- This is different from the **Open Sky Agreements** which are **bilateral agreements** that the two countries negotiate to provide rights for airlines to offer international passenger and cargo services. It expands international passenger and cargo flights. Recently, the **United Arab Emirates (UAE)** has expressed interest to have an **Open Sky Agreement with India**.

### Key Points

- **Reasons for USA Withdrawal:**
  - **Russia's continuous non compliance:** The USA had for over a decade accused Russia of non-compliance

with OST protocols, blaming Moscow of obstructing surveillance flights on its territory, while misusing its own missions for gathering key tactical data.

- **OST misused to claim Ukrainian region:** The USA also accused Russia of designating an airfield in the annexed Crimean Peninsula as an Open Skies refueling base as an illegal attempt by Russia to cement its claim to the Ukrainian region.
- **Risk to critical infrastructures:** Russia misused its flights over the USA and Europe to identify critical infrastructure for potential attack in a time of war.
- **Reasons for Russia Withdrawal:**
  - **USA limiting OST:** Russia defends its non compliance with the OST to allow flights over Kaliningrad (Russian exclave in Eastern Europe that lies between NATO allies Lithuania and Poland) citing the example of the US imposing similar limits on flights over Alaska.
  - **No assurance from NATO members:** After USA withdrawal from OST, Russia did not get the sought assurance from **North Atlantic Treaty Organization (NATO)** allies who continued to remain on the treaty that they would not transfer data collected by their flights over Russia to Washington (USA).
- **Significance:**
  - **For European NATO members:**
    - Russia's departure could adversely impact Washington's European allies, which rely on OST data to track Russian troop movements in the Baltic region.

Note:

- **Departure from Arms control treaties:**
  - The failure of the Open Skies Treaty follows the demise of another significant arms control accord, the **Intermediate-Range Nuclear Forces (INF) Treaty**, after both the US and Russia left it in 2019. This treaty aimed at eliminating their stocks of intermediate-range and shorter-range (or “medium-range”) land-based missiles which could carry nuclear warheads.
  - Withdrawal of the USA and Russia from OST has further deepened doubts on extension of the **New START treaty**, which expires in February, 2021.
- **For India:**
  - Growing mistrust between global powers could make it difficult for India to maintain good mutual relationships with both the countries if the hostility escalates in future.

#### Open Skies Treaty (OST)

##### ➤ Background:

- It was first **proposed by USA in 1955** to deescalate tensions during the **Cold War**.
- This treaty was eventually signed in 1992 **between NATO members and former Warsaw Pact countries** following the demise of the Soviet Union. It finally came into effect in 2002.
  - The **Warsaw Pact (1955)** was signed between Russia and her satellite states shortly after West Germany was admitted to NATO.
  - The Pact was a mutual defense agreement, which the Western countries perceived as a reaction against West Germany’s membership of NATO.

##### ➤ Aim:

- **Building confidence:** The OST aims at building confidence among its 34 signatories countries through **mutual openness**, thus reducing the chances of accidental war.

##### ➤ Terms:

- **Open surveillance:** Under the treaty, a member State can undertake surveillance **on any part of the host nation**, with the latter’s consent.
  - Only **approved imaging equipment** is permitted on the surveillance flights.
  - Officials from the host state **can also stay on board** throughout the planned journey.

- **Sharing strategic information:** The information gathered, such as on **troop movements, military exercises** and missile deployments, **has to be shared with all member States**.
  - Both **US and Russia** were signatories of the treaty.
  - India is **not a member** of this treaty.

## Chinese Incursions in Taiwan

### Why in News

The **USA has reaffirmed its support for Taiwan** following China’s warplanes entering Taiwan’s air defence **identification zone**.

- These overflights were part of a **long-standing pattern of incursions by China** aimed at pressuring the present democratically elected government of Taiwan to **accept China’s demand to recognise Taiwan as a part of Chinese territory**.

### Key Points

#### ➤ Conflict between China and Taiwan (Background):

- China and Taiwan **separated amid civil war in 1949** and **China considers Taiwan part of its territory** to be taken control of by force if necessary.
- But **Taiwan’s leaders** say that **Taiwan is a sovereign state**.
- After decades of hostile intentions and angry rhetoric, **relations between China and Taiwan started improving in the 1980s**. **China** put forward a formula, known as **“one country, two systems”**, under which Taiwan would be given significant autonomy if it accepted Chinese reunification.
- In **Taiwan, the offer was rejected**, but the government did relax rules on visits to and investment in China.
- There were also **limited talks** between the two sides’ unofficial representatives, though **Beijing’s insistence that Taiwan’s Republic of China (ROC) government is illegitimate** prevented government-to-government contact.
- **China’s implementation of a national security law in Hong Kong** in 2020 was seen by many as a yet another sign that Beijing was becoming significantly more assertive in the region.
- **USA vis-a-vis- China over Taiwan:**

Note:



- The **Chinese government passed an Anti-Secession Law in 2005** that provides conditions under which China **might employ non-peaceful means** to prevent the permanent separation of Taiwan from mainland China.
- The **USA** as part of the **Taiwan Relations Act (TRA) 1979**, is required to assist Taiwan if coerced or attacked by China.
- Thus, the recent chinese incursions and USA's opposition to it are manifestations of this contradicting stand of the USA and China on Taiwan.
- **USA's Stand:**
  - The USA **criticised the pattern of ongoing attempts by China** to intimidate its neighbours, including Taiwan.
  - It has **urged China** to cease its military, diplomatic, and economic pressure against Taiwan and instead **engage in meaningful dialogue with Taiwan's democratically elected representatives**.
- **China's Concerns:**
  - **USA's Strategic and Defense Support to Taiwan:**
    - Taiwan has sought to improve its defenses with the purchase of USA weapons, including upgraded **F-16 fighter jets**, armed drones, rocket systems and Harpoon missiles.
    - The Taiwanese government has also boosted **USA's support for Taiwan's indigenous arms industry**, including launching a program to build new submarines to counter China's ever-growing naval capabilities.
  - **Presence of the USA forces in Neighboring Waters:**
    - A USA aircraft carrier group led by the warship Theodore Roosevelt has entered the **South China Sea** to ensure freedom of the seas, and build partnerships that foster maritime security.
  - **One China Policy Challenged:**
    - This means that countries seeking diplomatic relations with the People's Republic of China (PRC, Mainland China) must break official relations with the Republic of China (ROC, Taiwan) and vice versa.
    - The existent diplomatic relationship of the Taiwan and its membership in intergovernmental organizations challenges this policy:
      - The ROC, Taiwan has diplomatic relations with **15 countries and substantive ties with**

many others such as **Australia, Canada, EU nations, Japan and New Zealand**.

- Besides, Taiwan has **full membership in 38 intergovernmental organizations** and their subsidiary bodies, including the **World Trade Organization, Asia-Pacific Economic Cooperation, Asian Development Bank** and Central American Bank for Economic Integration.

➤ **India's Stand on the Issue:**

- Since 1949, **India has accepted the "One China" policy** that accepts Taiwan and Tibet as part of China.
- However, India uses the policy to make a diplomatic point, i.e., if India believes in "One China" policy, China should also believe in a "One India" policy.
- Even though India has stopped mentioning its adherence to One China policy in joint statements and official documents since 2010, its engagement with Taiwan is still restricted due to the framework of ties with China.
  - **India and Taiwan do not have formal diplomatic relations** but since 1995, both sides have maintained representative offices in each other's capitals that function as de facto embassies.

**Taiwan**

- **Taiwan - the Republic of China (ROC)**, home to twenty-three million people, is an island off the southern coast of China that has been governed independently from mainland China since 1949.



- Its neighbours include China (officially the People's Republic of China, PRC) to the west, Japan to the northeast, and the Philippines to the south.
- **Taiwan is the most populous state that is not a member of the United Nations** and the largest economy outside the UN.
- Taiwan is **Asia's 5<sup>th</sup> largest economy**.
- It is a **global leader in chip manufacture** and the second-largest manufacturer of IT hardware, etc.

Note:

## West Asia Peace Conference

### Why in News

Recently, **Russia** backed a Palestinian proposal for a **West Asia Peace Conference**. The Conference is intended to **focus on a two-state solution**, under which Israel and a future Palestinian state would coexist.

### Key Points

#### ➤ Background:

- The support for the Conference came as the USA, which had sided with Israel under the administration of Donald Trump, intends to “restore credible USA engagement with Palestinians as well as Israelis.”

#### ➤ Participants in the Conference:

- The 10 participants would include **Israel, the Palestinians, the four members of the West Asia diplomatic quartet** (Russia, the **United Nation**, the USA and the **European Union**), along with four Arab states — **Bahrain, Egypt, Jordan and the UAE**.

#### ➤ Russia’s Suggestion:

- Russia suggested that the **West Asia Peace Conference** could be held at the **ministerial level**.

#### ➤ Other Related Developments:

- The **Abraham Accord** between Israel, the United Arab Emirates and Bahrain is mediated by the USA. It was the first Arab-Israeli peace deal in 26 years.
- Palestinians are worried about the impact of the Accords.

### Israel-Palestine Conflict

#### ➤ Background:

##### ○ British Phase:

- Britain took control of the area known as Palestine after the ruler of that part of the Middle East, the **Ottoman Empire**, was defeated in **World War I**.



- The land was inhabited by a Jewish minority and Arab majority.
- Tensions between the two peoples grew when the **international community gave Britain the task of establishing a “national home” in Palestine for Jewish people**.
  - For Jews, it was their ancestral home, but Palestinian Arabs also claimed the land and opposed the move.
- In **1948**, unable to solve the problem, British rulers left and **Jewish leaders declared the creation of the state of Israel**.

#### ○ Post British Phase:

- In another war in **1967**, Israel occupied **East Jerusalem** and the **West Bank**, as well as most of the **Syrian Golan Heights**, and **Gaza** and the Egyptian Sinai peninsula.
  - Most Palestinian refugees and their descendants live in Gaza and the West Bank, as well as in neighbouring Jordan, Syria and Lebanon.
    - Neither they nor their descendants have been allowed by Israel to return to their homes - Israel says this would overwhelm the country and threaten its existence as a Jewish state.
  - Israel still occupies the West Bank, and although it pulled out of Gaza the **United Nations** (UN) still regards that piece of land as part of occupied territory.
  - Israel claims the whole of Jerusalem as its capital, while the Palestinians claim East Jerusalem as the capital of a future Palestinian state.
  - In the past 50 years Israel has built settlements in these areas, where more than 6,00,000 Jews now live.
  - Palestinians say these are illegal under international law and are obstacles to peace, but **Israel denies this**.
- #### ➤ Shift in the Stand of the USA:
- The USA has played a partisan role in the Israeli-Palestinian conflict.
  - In the last few years, developments in the USA mark a clear shift from the **Oslo Accords** in **favor of support for Israeli plans** to annex a large fraction of the West Bank and design a new settlement of the conflict according to its interests.

Note:





- USA's peace plan (**Peace to Prosperity: A Vision to Improve the Lives of the Palestinian and Israeli People**) would have guaranteed that Israel would control a unified Jerusalem as its capital and not require it to uproot any of the settlements in the West Bank.
  - The plan was drawn without any meaningful Palestinian participation and was loaded in Israel's favour.
- In **1993** under the Oslo Accords, **Israel** and the **Palestine Liberation Organisation (PLO)** agreed to officially recognize each other and renounce the use of violence.
- The Oslo Accords also **established the Palestinian Authority**, which received limited autonomy in the Gaza Strip and parts of the West Bank.
- However, recently after the **change in administration**, the USA said it would **move towards renewing ties with the Palestinians**.
- **India's Stand:**
  - India was one of the few countries to **oppose the UN's partition plan in November 1947**, echoing its own experience during independence a few months earlier. In the decades that followed, the Indian political leadership actively supported the Palestinian cause and withheld full diplomatic relations with Israel.
  - India **recognised Israel in 1950** but it is also the **first non-Arab country to recognise PLO as the sole representative of the Palestinian**.
    - India is also one of the first countries to recognise the statehood of Palestine in 1988.
  - In 2014, India favored the **United Nations Human Rights Council's (UNHRC)** resolution to probe Israel's human rights violations in Gaza. Despite supporting the probe, India abstained from voting against Israel in UNHRC IN 2015.
  - As a part of Link West Policy, India has **de-hyphenated its relationship with Israel and Palestine in 2018** to treat both the countries mutually independent and exclusive.
  - In June 2019, India voted in favor of a decision introduced by Israel in the **UN Economic and Social Council (ECOSOC)** that objected to granting consultative status to a Palestinian non-governmental organization.

- So far **India** has tried to maintain the image of its historical moral supporter for Palestinian self-determination, and at the same time to engage in the military, economic, and other strategic relations with Israel.

### Suggestions

- The **world at large needs to come together for a peaceful solution** but the reluctance of the Israeli government and other involved parties have aggravated the issue more. Thus a **balanced approach towards the Israel-Palestine issue** would help to maintain favorable relations with Arab countries as well as Israel.

## GI Tag for Pakistani Basmati

### Why in News

Recently, Pakistan received the **Geographical Indication (GI) tag** for its **Basmati** rice under its Geographical Indications Act 2020.

- Pakistan is fighting a case in the **European Union (EU)** against India's move to get Basmati Rice as its product.

### Key Points

- **India-Pakistan on Basmati Rice:**
  - The issue of protecting Basmati rice as a product of Pakistan came to the forefront **after India submitted an application to the European Union (EU)** claiming sole ownership of the commodity in Sept 2019.
    - India also claimed that the **region producing basmati is a part of northern India**, below the foothills of the Himalayas forming part of the Indo-Gangetic plain.
    - The Indian claim to the EU was challenged in December 2019 and the main argument by Pakistan was that **Basmati rice was a joint product of India and Pakistan**.
  - International laws require that **before applying for registration of any product in the international market it has to be protected under the geographical indication laws of that country**.
    - Pakistan enacted the **Geographical Indications (Registration and Protection) Act in March 2020**, which gives it the right to oppose Indian application for registration of Basmati rice exclusive rights.

Note:



- **Significance of Pakistan's GI tag for its Basmati:**
  - A GI tag would **strengthen Pakistan's case in the EU**.
    - Pakistan exported 5,00,000-7,00,000 tonnes of Basmati rice annually to different parts of the world out of which 2,00,000 tonnes to 2,50,000 tonnes is being shipped to EU countries.
- **Effect on India:**
  - Basmati rice was a **joint heritage of India and Pakistan** and Pakistan is as entitled to secure its Basmati rice trade as India.
  - However, Pakistan securing the GI tag for its basmati rice would, **in no way, affect India's Basmati exports**.
  - Since **Basmati rice fetches higher prices in the international markets**, India had attempted to block Pakistan's trade in the EU by declaring that its Basmati was the geographically original one.
- **GI tag for Basmati Rice in India:**
  - India is a producer of premium Basmati and it has been grown from time immemorial in the **Indo-Gangetic Plains (IGP)** area of India and **18 districts of Pakistan's Punjab**.
    - It had been a tough battle for the country to protect Basmati name from the encroachment of various nations which all came out with their own versions of Basmati.
  - **Agricultural and Processed Food Products Export Development Authority (APEDA)** got GI tag for the region located in IGP below the foothills of the Himalayas, spread across seven states (Himachal Pradesh, Jammu and Kashmir, Punjab, Haryana, Uttarakhand, Western Uttar Pradesh (26 districts) and Delhi) in May 2010.
  - **Reasons Given:**
    - The origin and reputation of Basmati rice as a 'long-grain, aromatic rice' from the IGP is found in tradition, folklore, scientific and culinary literature and political-historical records.
    - Dehraduni Basmati, Amritsar Basmati and Tarawari Basmati are few varieties which have become famous over the period of hundreds of years.

#### Geographical Indication (GI) Tag

##### ➤ About:

- A **Geographical Indication (GI)** is a sign used on products that have a **specific geographical origin and possess qualities or a reputation that are**

**due to that origin.** In order to function as a GI, a sign must identify a product as originating in a given place.

- In addition, the qualities, characteristics or reputation of the product should be essentially due to the place of origin.
  - Since the **qualities depend on the geographical place of production**, there is a clear link between the product and its original place of production.
- It is used for **agricultural, natural and manufactured goods**.

##### ➤ Benefit of GI tag:

- Once the GI protection is granted, **no other producer can misuse the name to market similar products**. It also provides **comfort to customers** about the authenticity of that product.
- A registered Geographical Indications **prohibits a third party to use such GI by any means** in the designations or presentations of goods indicating that such goods originate in a geographical area.

##### ➤ International Protection for GI:

- Internationally GI are covered as a **component of Intellectual Property Rights (IPRs)** under the **Paris Convention** for the Protection of Industrial Property.
  - The **Paris Convention, adopted in 1883**, applies to industrial property in the widest sense, including patents, trademarks, industrial designs, utility models, service marks, trade names, **geographical indications** and the repression of unfair competition.
- GI is also governed by the **World Trade Organisation's (WTO's)** Agreement on **Trade-Related Aspects of Intellectual Property Rights (TRIPS)**.

##### ➤ GI Protection in India:

- India, as a member of the World Trade Organization (WTO), enacted the **Geographical Indications of Goods (Registration & Protection) Act, 1999** which came into force with effect from 2003.
  - The Act provides registration and also protection of GI goods in India.
  - This Act is administered by the Controller General of Patents, Designs, and Trademarks,

Note:

who is also the Registrar of Geographical Indications.

- The **Geographical Indications Registry for India is located in Chennai.**
- The registration of a geographical indication is **valid for a period of 10 years.** It can be renewed from time to time for a further period of 10 years each.

## China's New Villages in Arunachal Pradesh

### Why in News

Recently, there have been reports of Chinese construction of three villages in Arunachal Pradesh 5 kilometres from the **Bum La pass.**

- **Bum La Pass is one of the four officially agreed BPM (Border Personnel Meeting) points** between the Indian Army and the People's Liberation Army of China.
- Earlier in 2020, China had **begun work on a strategically significant railway line** that will link Sichuan province with Nyingchi in Tibet, which lies close to Arunachal Pradesh border.

### Key Points

- **About the New Village built Last Year:**
  - The satellite images, dated November 2020, show that a full-fledged village has been **built on the banks of the River Tsari Chu** in the Upper Subansiri district of Arunachal Pradesh.
    - The village is located a couple of kilometres across the **Line of Actual Control (LAC).**



- China had earlier built a **permanent construction of military barracks in this area.**
- The area has been **under Chinese control since 1959.**
- It is at least 2 km south (in Indian territory) of the **McMahon Line**, which China doesn't recognise. After the **1962 war**, India stopped patrolling the area.
  - China considers the **McMahon Line illegal and unacceptable** claiming that Tibetan representatives who had signed the 1914 Convention held in Shimla which delineated the McMahon line on the map were not having rights to do so.

### ➤ Other Spots of Disagreement:

- There are close to **two dozen spots along the entire length of the Line of Actual Control (LAC)** in all sectors where India and China do not agree on its alignment.
- **Line of Actual Control:**
  - It is divided into **three sectors:**
    - The **eastern sector** which spans Arunachal Pradesh and Sikkim (1346 km).
    - The **middle sector** in Uttarakhand and Himachal Pradesh (545 km).
    - The **western sector** in Ladakh (1597 km).
  - The alignment of the LAC in the eastern sector is **along the 1914 McMahon Line.**

### ➤ Case of Arunachal Pradesh:

- India's claim line is different from that of the LAC. It is the line seen in the official boundary marked on the maps as released by the Survey of India, including Aksai Chin (occupied by China). The **state of Arunachal Pradesh is an 'integral and inalienable' part of India.**
- **In China's case**, LAC corresponds mostly to its claim line, but in the eastern sector, **it claims the entire Arunachal Pradesh as South Tibet.**

### ➤ China's Intention:

- The construction of the village has been seen by analysts as a move **to bolster China's claim to the area**, and part of a **broader recent push by China** to build civilian settlements in disputed frontier areas, which **it has also done with Bhutan.**

### ➤ Implications on India:

- **Security Concerns:**

Note:

- A village near the border will largely improve the efficiency and convenience of military personnel and material transportation and logistical supplies in the border area.
- In situations of direct standoff near Arunachal Pradesh border, as was seen during Doklam or recent **Ladakh standoff**, **China might be at an advantageous position.**
  - **Doklam Issue:** Indian troops intervened to block the path of Chinese soldiers engaged in building road-works on the Doklam plateau of Bhutan's territory that Beijing laid claim.

#### ➤ Recent Steps Taken by India:

- India will spend 10% funds of the **Border Area Development Programme (BADP)** only to improve the infrastructure along the China border.
- The Border Roads Organisation (BRO) constructed the **Daporijo bridge** over Subansiri river in Arunachal Pradesh in a record span of just 27 days.
  - It links roads leading upto the LAC between India and China.
- Recently the Defence Minister virtually laid the foundation of a **tunnel at Nechipu in West Kameng district of Arunachal Pradesh.**
  - It will **shorten travel time for troops** till the LAC through Tawang, which China claims to be its territory.
- The BRO is already **constructing an all-weather tunnel under the Se La pass in Arunachal Pradesh** which connects Tawang to the rest of Arunachal and Guwahati.
- The state government of Arunachal Pradesh has advocated **selection of 10 census towns along the India-China border** as pilot projects for infrastructure development in order to stop people living along its international borders, specifically with China, from migrating to faraway urban centres in the State.
- Recently, the Defence Minister inaugurated the **Sisseri River Bridge** located at **lower Dibang Valley in Arunachal Pradesh** connecting Dibang Valley and Siang.
- In 2019, the Indian Air Force inaugurated resurfaced runway at India's **easternmost Village-Vijaynagar (Changlang district)** in Arunachal Pradesh.
- In 2019, the Indian Army conducted **exercise 'HimVijay'** in Arunachal Pradesh and Assam with its newly **created Integrated Battle Groups (IBG).**

- **Bogibeel bridge**, which is India's longest road-rail bridge connecting Dibrugarh in Assam to Pasighat in Arunachal Pradesh was inaugurated in 2018.
  - It will **facilitate quicker movement of troops and equipment to areas near the India-China border.**

## India's Vaccine Diplomacy

### Why in News

India has decided to ship out doses of the **novel coronavirus vaccine** to 'neighbouring and key partner countries'.

- The first batches of vaccine have been **already delivered to Bhutan and Maldives** by special planes as a **grant or gift.**

### India's Coronavirus Vaccines

- Recently, the **Drug Controller General of India (DCGI)** granted the approval for two vaccines - **COVISHIELD** by Serum Institute of India and **COVAXIN** by Bharat Biotech.
  - **COVISHIELD:** It is the name given to an **Oxford-AstraZeneca** Covid-19 vaccine which is technically referred to as **AZD1222** or **ChAdOx 1 nCoV-19.**
  - **COVAXIN:** It is **India's only indigenous Covid-19 vaccine.** This vaccine has been found to be safe and no major side effects are expected.
- Of the two vaccines, **COVAXIN** is an **inactivated vaccine** whereas **COVISHIELD** is a **live vaccine.**

### Key Points

- **Vaccine Diplomacy:**
  - **Meaning:** Vaccine diplomacy is the **branch of global health diplomacy** in which a nation uses the development or delivery of vaccines to strengthen ties with other nations.
  - **Collaborative Effort:** It also includes the joint development of life-saving vaccines and related technologies, with the major actors typically **scientists coming together to work irrespective of the kind of diplomatic relationship** between the participating countries.
  - **Benefit for India:** It could provide innovative opportunities to promote India's foreign policy and diplomatic relations between nations in its neighbourhood and across the globe.

Note:



- India had **earlier supplied** hydroxychloroquine, Remdesivir and paracetamol tablets, as well as diagnostic kits, ventilators, masks, gloves and other medical supplies to a large number of countries to help them deal with the pandemic.
  - India has also **carried out capacity building and training workshops** for neighbouring countries.
- **India's Vaccine Diplomacy Plan:**
- Shipments have begun arriving in the **Maldives, Bhutan, Bangladesh and Nepal. Myanmar and the Seychelles** are next in line to get consignments.
  - In cases of **Sri Lanka, Afghanistan and Mauritius**, India is awaiting their confirmation of necessary regulatory clearances.
  - The **only exception to India's regional vaccine diplomacy would be Pakistan**, which has cleared the AstraZeneca vaccine for use, but has neither requested nor discussed any doses from India yet.
- **Importance of India's Vaccine Diplomacy:**
- **Strategic:**
    - **Earning long term goodwill:** By financing shipments from India's assistance programmes for cash-strapped neighbouring countries desperately needing such assistance, India shall earn the long-term goodwill of its immediate neighbours and across Indian ocean countries
      - It is in line with **India's neighborhood first initiative**.
    - **Advantage over Chinese:** China recently offered its vaccines to Nepal, Afghanistan, Sri Lanka and Bangladesh as it held a **multilateral dialogue** with the four countries and Pakistan on anti-epidemic prevention.
      - Early shipment from India in these countries could help counter China's vaccine and mask diplomacy in its neighbourhood.
    - **Leverage over western countries:** While the affluent western world, notably the US and Europe, are focused almost exclusively on their own problems, India is being appreciated for helping its neighbours and developing countries, who could not afford US and European vaccines.
  - **Economic:**
    - **Make India global supply centre:** Beyond India's immediate neighbours, South Korea, Qatar, Bahrain, Saudi Arabia, Morocco and South

Africa have all shown inclinations to purchase vaccines from India which is estimated to be 60% of the global supply of inoculants.

- **Boost Pharma Manufacturing in India:** India can become the pharmacy of the world. If Indian vaccines help developing countries to meet their urgent needs, they can become the future long term destination for market expansion of Indian pharma.

- **Help in reviving the economy:** If India becomes the manufacturing hub to corona vaccines across the world, it shall give a boost to the GDP of India.

○ **Rescue from cold war over vaccine:**

- The **US-China cold war** has been accused of making distribution of vaccines "political football", which caused the inordinate delay in commencing the inoculation programmes by **WHO**. Thus, early shipment of vaccines by India is seen as a rescue from this bipolar tussle.

○ **Earning moral right:**

- India's vaccine distribution comes at a time when WHO director-General has criticised moral corruption of drug manufacturers from rich countries for delaying distribution of vaccines and targeting shipments to rich countries only. This could help India have a moral right to have **greater say in international forums**.

○ **Disrupts vaccine nationalism:**

- Vaccine Nationalism is the mechanism through which a country manages to secure doses of vaccines for its own citizens or residents and prioritises its own domestic markets before they are made available in other countries through **pre-purchase agreements** with a vaccine manufacturer.

- The major drawback of vaccine nationalism is that it puts countries with fewer resources and bargaining power at a disadvantage. India's intervention by making vaccines available to needy countries disrupted the vaccine nationalism.

○ **Facilitating global collaboration:**

- India vaccines supply could cater greatly to the global collaboration which is being done through the **WHO-backed COVAX Facility mechanism**.

Note:





## Suggestions

- **India needs to balance its domestic needs with diplomatic commitments. The vaccination drive in India** commenced in January, 2021 is going to be the **World's Largest Vaccination Program**. India has the challenge that while it distributes the vaccine to the world, it should ensure the much needed vaccine supply to those in India who cannot afford it.

## India- Sri Lanka

### Why in News

Recently, the Government of Sri Lanka decided to rebuild a demolished memorial at **Jaffna University** after the High Commissioner of India's concerns.

- The demolition of a memorial paying tribute to Tamil civilians killed during the civil war between LTTE and the Sri Lankan Army in 2009 has brought attention to unaddressed issues of **minority rights** of Tamilians in Sri Lanka again in the **India-Srilanka relations**.



### Key Points

- **Issues of Tamilians in Sri Lanka**
  - **Denial of Citizenship:** The problem of the Srilankan Tamils began earlier than the 1950s. After independence in 1948 the **Srilankan government felt that the Tamils were not Srilankan** because they had Indian ancestry.
    - The majority of the Tamils were **denied Srilankan citizenship** due to which most of the Tamils continued to live in poverty in the tea estates of Sri Lanka.
  - **Linguistic Discrimination:** The conflict between Sinhalese and Tamils in Sri Lanka started in 1956 when **Sinhala was made the official language** by the country's President and large scale discrimination began against the Tamils.
  - **Religious Discrimination:** The discrimination against the Tamil population continued throughout the 1960s as **Buddhism was given the primary place in the state** and the number of Tamils employed by the state and admitted into institutions of higher learning was greatly restricted.

- **Intensified Movements:** During this period the Tamils responded to their oppression largely through a political and a non-violent protest movement. In the 1970s, however, there was an increased trend towards Tamil separatism and militancy that gave rise to a terrorist organization called LTTE.
- **Liberation Tigers of Tamil Eelam (LTTE):** It was formed in 1976 as the self-styled "national freedom movement of the people of Tamil Eelam" and began a guerilla war on the government and administration.
  - It undertook numerous terrorist activities in Sri Lanka especially against the Sinhalese and executed the **assassination of Rajiv Gandhi (the ex Prime Minister of India)**.
  - After a long strife, and millions of casualties, the civil war with LTTE ended in 2009. India played an important role in helping Sri Lanka to uproot terrorism from its homeland.

### ➤ Concerns for India:

- **Rehabilitation of Refugees:** A lot of Srilankan Tamils who evaded from Srilankan civil war (2009) are seeking refuge in Tamil Nadu. They are not returning in fear of being targeted again. It is a challenge for India to rehabilitate them.
- **Sentiments of Indian Tamils:** A number of protests and criticism is drawn at the end of Indian Government for overlooking the plight of Srilankan Tamils to maintain good relationship with Sri Lanka.
- **Strategic interests vs Tamil question:** Often India has to trade off on the question of Tamilian minority rights over strategic issues to protect its economic interests in its neighborhood and to counter Chinese influence in Indian Ocean.

### ➤ India - Sri Lanka Confidence Building Measures:

- **Currency Swap Agreements:** **The Reserve Bank of India (RBI)** had signed an agreement for extending a **USD 400 million currency swap** facility to Sri Lanka to boost the foreign reserves and ensure financial stability of the country, which is badly hit by Covid-19 pandemic.
- **High Level Exchanges:** Political relations between India and Sri Lanka have been marked by high-level exchanges of visits at regular intervals.
- **India's Support against Terrorism:** During the course of the civil war, India supported the right of the Government of Sri Lanka to act against terrorist forces.

Note:



- **The Indian Housing Project:** It is Government of India's flagship project of developmental assistance to Sri Lanka. Its initial commitment is to build 50,000 houses for those affected by the civil war as well as for the estate workers in the plantation areas.
- **Addressing Fishermen Issue:** Given the proximity of the territorial waters of both countries, especially in the **Palk Straits** and the **Gulf of Mannar**, incidents of straying of fishermen are common.
  - Both countries have agreed on certain practical arrangements to deal with the **issue of bona fide fishermen** of either side crossing the **International Maritime Boundary Line**.
- **Joint Exercises:** India and Sri Lanka conduct joint Military (**Mitra Shakti**) and Naval exercise (**SLINEX**).
- **Participation in Groupings:** Sri Lanka is also a member of regional groupings like **BIMSTEC** (Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation) and **SAARC** in which India plays a leading role.
- **SAGAR:** Srilanka supports India's concern for the security of Indian ocean with its 'Neighbourhood First' policy and **SAGAR (Security and Growth for all in the Region)**.
- **Line of Credit:** India has extended a \$400 million line of credit to Sri Lanka to help strengthen its infrastructure and economy. An additional \$50 million to help Sri Lanka combat terrorism.
- **Bangladesh War of Independence: Vijay Diwas** is observed on 16<sup>th</sup> December every year to mark India's victory over Pakistan in the 1971 war.
  - The Government of India, on 3<sup>rd</sup> December 1971, declared that it would go for war with Pakistan to save Bengali Muslims and Hindus.
  - This war was fought between India and Pakistan for 13 days.
  - On 16<sup>th</sup> December 1971, the chief of the Pakistani forces with 93,000 soldiers had surrendered unconditionally to the allied forces consisting of **Indian Army** and **Mukti Bahini** in Dhaka.
    - Mukti Bahini refers to the armed organizations that fought against the Pakistan Army during the Bangladesh Liberation War. It was a guerrilla resistance movement.
  - Bangladesh was born on this day. Hence, Bangladesh celebrates its **independence day (Bijoy Dibos) on 16<sup>th</sup> December every year**.

### India-Bangladesh Relations

- India was one of the first countries to recognize Bangladesh and establish diplomatic relations immediately after its independence in December 1971.
- **Defence Cooperation:**
  - Various **Joint exercises** of Army (**Exercise Sampriti**) and Navy (**Exercise Milan**) take place between the two countries.
  - **Border Management:** India and Bangladesh share **4096.7 km.** of border, which is **the longest land boundary that India shares with any of its neighbours**.
  - The India-Bangladesh **Land Boundary Agreement (LBA)** came into force following the exchange of instruments of ratification in June 2015.
- **Cooperation over Rivers:**
  - India and Bangladesh share **54 common rivers**. A bilateral **Joint Rivers Commission (JRC)** has been working since June 1972 to maintain liaison between the two countries to maximize benefits from common river systems.
- **Economic Relations:**
  - Bangladesh is India's **biggest trade partner** in South Asia. India's exports to Bangladesh for financial year 2018-19 (April-March) stood at **US 9.21 billion USD** and imports from Bangladesh for the same period stood at **US 1.22 Billion USD**.

## 50 Years of India-Bangladesh Relations

### Why in News

Commemorating **50 years of the 1971 India-Pakistan war** that led to the liberation of Bangladesh, a 122-member contingent of the Bangladesh Armed Forces has recently participated in the **72<sup>nd</sup> Republic Day** parade.

- This year, India and Bangladesh are also celebrating **50 years of the establishment of their ties**.

### Key Points

- This is the **third time** the Republic Day parade in India has witnessed the participation of a military contingent from abroad.
  - Previously **French troops** marched in 2016 and **UAE troops** in 2017.

Note:

- Bangladesh has appreciated the **Duty-Free and Quota Free access** given to Bangladeshi exports to India under **South Asian Free Trade Area (SAFTA)** since 2011.
- **Cooperation in Connectivity:**
  - Both countries jointly inaugurated the newly restored railway link between **Haldibari (India) and Chilahati (Bangladesh)**.
  - Welcomed the signing of the second addendum to the Protocol on **Inland Water Transit and Trade (PIWTT)**.
  - Agreed to an early operationalization of the **Bangladesh-Bhutan-India-Nepal (BBIN) initiative Motor Vehicles Agreement** through the expeditious signing of the Enabling MoU for Bangladesh, India and Nepal to commence the movement of goods and passengers, with provision for Bhutan to join at a later date.
- **Cooperation in Power Sector:**
  - This has become one of the hallmarks of India-Bangladesh relations. Bangladesh is currently importing **1160 MW** of power from India.
- **Partnership on Multilateral forums:**
  - India thanked Bangladesh for supporting India in its election to **the United Nations Security Council**.
  - Both countries agreed to continue working together towards achieving early reforms of the **UN Security Council**, combating climate change, attainment of the **Sustainable Development Goals (SDGs)** and protection of the rights of migrants.
  - Highlighted that regional organisations such as the **South Asian Association for Regional Cooperation (SAARC)** and the **Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation (BIMSTEC)** have an important role to play.
  - Bangladesh thanked India for convening **the SAARC leaders Video Conference** in March 2020 and for creation of **the SAARC Emergency Response Fund** to counter effects of the global pandemic in the South Asian region.
  - Bangladesh will assume chairmanship of **the Indian Ocean Rim Association (IORA) in 2021** and requested the support of India for working towards greater maritime safety and security.
- **Recent Development:**
  - Recently, India and Bangladesh signed seven

agreements and also inaugurated three projects to deepen their partnership.

- The use of the **Chattogram and Mongla ports** in Bangladesh for movement of goods to and from India, particularly from Northeastern India.
- Use of **Bangladesh's Feni river** for drinking water supply in Tripura.
- **Further areas of Cooperation:**
  - The two countries need to focus on priority areas, such as **investments, security connectivity development, cross border energy cooperation, blue economy, cultural economy, environment and disaster management** etc.
  - Resolve the refugees (**Rohingyas**) crisis.
  - **During Covid 19:**
    - Reiterating the highest priority India attaches to Bangladesh under India's Neighbourhood First policy, **India assured that vaccines for Covid-19** would be made available to Bangladesh as and when produced in India.
    - India also offered collaboration in therapeutics and partnership in vaccine production.
- **Emerging Disputes:**
  - There should be efforts to resolve pending issues concerning **sharing of waters, resolving continental shelf issues in the Bay of Bengal, bringing down border incidents to zero, and managing the media**.
  - Bangladesh has already raised concerns over roll out of the **National Register of Citizens (NRC)** in Assam, an exercise carried out to identify genuine Indian citizens living in Assam and weed out illegal Bangladeshis.
  - Currently, Bangladesh is an active partner of the **Belt and Road Initiative (BRI)** that Delhi has not signed up to.
  - In the security sector, Bangladesh is also a major recipient of Chinese military inventory, including submarines.

## 5<sup>th</sup> India – Singapore Defence Ministers' Dialogue

### Why in News

Recently, the **5<sup>th</sup> Defence Ministers' Dialogue (DMD)** between **India and Singapore** was successfully held through a video conferencing.

Note:





### Key Points

- **Agreement Signed:**
  - **Implementing Agreement on Submarine Rescue Support and Cooperation** between the two Navies was signed.
- **Joint Stand:**
  - **Bilateral Cooperation:**
    - Both the countries conveyed their full support towards the early conclusion of agreements to **facilitate conduct of live firings and to establish reciprocal arrangements for the cross-attendance of military courses.**
    - They welcomed the initiatives to expand bilateral defence cooperation including the implementing agreement on **Humanitarian Assistance and Disaster Relief (HADR)** cooperation in August 2020.
    - The **cyber agencies** of both armed forces have also **stepped up engagements.**
  - **Impact of Covid-19:**
    - Both countries exchanged views on the impact of the global **Covid-19 pandemic** on the defence and security engagements, including the best practices adopted by their Armed Forces.
  - **Defence Exercises:**
    - Both the countries successfully conducted the **27<sup>th</sup> edition of Singapore-India Maritime Bilateral Exercise (SIMBEX)** and also participated in the second edition of the **Singapore-India-**

**Thailand Maritime Exercise (SITMEX)**, both held in November 2020.

- These **exercises enhance interoperability** amongst the navies and **underscore the shared responsibility** of the countries to **work together to keep sea lines of communications open.**

#### ➤ **India's Stand:**

- India **conveyed gratitude** for the role of the **Singapore Armed Forces**, in supporting foreign workers, many of whom were Indian Nationals, at the peak of pandemic.
- India reaffirmed **Association of Southeast Asian Nations (ASEAN)** centrality in the regional security architecture and pledged India's support to all endeavours of the **ASEAN Defence Ministers' Meeting (ADMM)-Plus.**

#### ➤ **Singapore's Stand:**

- Singapore complimented India's successes in bringing down the overall numbers of **Covid-19 cases** despite challenges of scale in terms of geography and population.
- It also expressed **support for India's upcoming co-chairmanship** of the **ADMM-Plus Experts' Working Group on HADR.**

#### Note:

- **Singapore** has been **ranked 2<sup>nd</sup>** in the most powerful passport report '**Henley Passport Index 2021**'.
- The **first UN treaty to be named after Singapore**, the United Nations Convention on International Settlement Agreements Resulting from Mediation (or, **Singapore Convention on Mediation**) recently came into force.
- Recently, the **Hawker Culture in Singapore** was inscribed on the UNESCO Representative List of the Intangible Cultural Heritage of Humanity at the 15<sup>th</sup> session of the Intergovernmental Committee (IGC).

### **India-Singapore Relation**

#### ➤ **Defence and Security Cooperation:**

- India and Singapore share **similar concerns** about **the challenges posed by terrorism and extremism** and have found it mutually beneficial to evolve a broad framework of security cooperation.
- Singapore participates in **Indian Ocean Naval Symposium (IONS)** and multilateral Exercise **MILAN** hosted by Indian Navy.

Note:



- Singapore's membership of **Indian Ocean Rim Association (IORA)** and India's membership of ADDM+ (ASEAN Defence Ministers' Meeting - Plus) provides a platform for both countries to coordinate positions on regional issues of mutual concern.
- **Science & Technology Cooperation:**
  - **Indian Space Research Organisation (ISRO)** launched Singapore's first indigenously built micro-satellite in 2011, 2 more in 2014 and 6 in 2015.
  - In June 2018, both the countries signed six Memorandum of Understanding (MoU) in the area of **artificial intelligence, machine learning, cognitive computing and big data analytics** to improve **healthcare, cybersecurity, automation, mobility, smart energy systems and e-governance**.
- **Trade and Economic Cooperation:**
  - Singapore is **India's 2<sup>nd</sup> largest trade partner** among ASEAN countries.
  - **Total Foreign Direct Investment (FDI)** from Singapore into India was **USD 73.3 billion** (till June 2018) which was 19% of total FDI inflow.
  - The **outward Indian FDI to Singapore was USD 62.9 billion** (till August 2018), making Singapore one of the top destinations for Indian investments.
  - In 2018, the High Commission of India also launched a **startup engagement platform, India-Singapore Entrepreneurship Bridge (InSprenneur)**.
- **Infrastructure and Connectivity:**
  - **Connectivity:** Singapore is directly connected to 18 Indian cities by 8 airlines, there are now **308 weekly services (616 weekly flights) by Indian and Singaporean airlines**.
  - **Smart Cities:** A consortium of Singapore companies is developing **Amaravati, the new capital city of Andhra Pradesh**. Singapore is also working with Rajasthan in preparing Concept Plans for **townships in Udaipur and Jodhpur**; with Himachal Pradesh for developing an integrated **township of Greater Shimla**; and with Maharashtra for **development of Orange Smart City and master planning of Pune Metropolitan Region**.
- **Cultural Cooperation:**
  - Singapore's large Indian diaspora through a number of cultural societies and Singapore's official support sustains a **high level of cultural activity in Singapore**.

- They celebrated the 4<sup>th</sup> **International Day of Yoga (IDY)** through 173 yoga sessions and attended by approx. 8000 people.
- Even on **Mahatma Gandhi's 150<sup>th</sup> birth anniversary**, celebrations were launched with a projection of Gandhiji's video on the world's largest HD video screen at Suntec Convention Centre.
- **Indian Community:**
  - Ethnic Indians constitute about **9.1% or around 3.5 lakhs of the resident population of 3.9 million in Singapore**.
  - **ASEAN-India Pravasi Bharatiya Divas (PBD)** was held in Singapore on 6-7 January 2018 as part of commemoration of 25 years of **ASEAN-India Partnership**.

## Kashmir Debate in UK's Parliament

### Why in News

Recently, India has expressed its concern over a **debate on Kashmir in the Houses of Parliament complex in London**.



- Earlier in October 2020 a delegation of **European Union Members of Parliament (MEPs)**, comprising 27 Members of the European Parliament (MEPs) from Italy, Britain, France, Germany, Czech Republic, and Poland, visited Srinagar, nearly three months after the **revocation of Article 370**.

### Key Points

- **Background:**
  - A debate was organised by some **Members of Parliament in the United Kingdom (UK)**, titled **"Political situation in Kashmir"**.
  - It raised concerns of **alleged human rights violations** and called on the UK government to seek access to the region for direct reports from Jammu and Kashmir and **Pakistan-occupied Kashmir (PoK)** to be presented in the UK Parliament in future.
- **India's Concern:**
  - The **terminology** used in the debate was problematic, regarding the reference to **"Kashmir"** in the title

Note:



- there is a need to differentiate between **the Union Territory of Jammu and Kashmir**, which is an integral part of India, and **Pakistan Occupied Kashmir** (when the erstwhile princely state of Kashmir legally acceded to India in October 1947, this part was forcibly and illegally occupied by Pakistan).

- The debate ignored current ground reality of **the Union Territory of Jammu and Kashmir** and, instead chose to reflect false assertions of the kind promoted by a third country (Pakistan), such as unsubstantiated allegations of ‘**genocide**’, ‘**rampant violence**’ and ‘**torture**’.

#### ➤ **India’s Stand:**

- The Indian High Commission in London sought to highlight that since last year, a smart wi-fi project has enabled **high-speed internet access in the region** and that despite threats of terror attacks, challenging weather conditions and the **Covid-19** pandemic, landmark **District Development Council (DDC) elections were concluded in December 2020**.
- India stands ready to engage with Pakistan on all outstanding issues – including on Jammu and Kashmir in accordance with the **Shimla Agreement (1972)** and the **Lahore Declaration (1999)** in an atmosphere free from terror, hostility and violence.

#### ➤ **UK Government’s Stand:**

- Although there were human rights concerns on both sides of the **Line of Control (LoC)**, the UK will **not play any mediatory role in a bilateral India-Pakistan matter**.
- The government’s policy (on Kashmir) remains stable, **it’s unchanged**.
  - It continues to believe that India and Pakistan need to find a lasting political resolution to the situation that takes into account the wishes of the Kashmiri people as laid out in the **Simla Agreement (1972)**.

## India & Oman

### **Why in News**

Recently, a meeting of the **India-Oman Strategic Consultative Group (IOSCG)** was held with the first **high-level official visit** from Oman to India since the onset of **Covid-19 pandemic**.

### **Key Points**

- **Partnership during Pandemic:** India assured assistance to Oman in its requirement for **Covid-19** vaccines. India had also facilitated **food and medical supplies to Oman** during the **pandemic**.
  - Previously both the countries have expressed satisfaction on the operationalisation of the **Air Bubble arrangement** between the two countries during **covid-19**.
    - **Air bubbles** (travel corridors or travel bubbles) are systems established between **two countries** that perceive each other **to be safe and allow carriers of both the countries to fly passengers either way** without any restrictions.
- **Comprehensive Review:** Both sides reviewed the entire spectrum of India-Oman relationship including in political, energy, trade, investment, defence, security, space, mining, Science & Technology, culture and consular fields.



### **India Oman Relations**

#### ➤ **Background:**

- The two countries across the Arabian Sea are linked by **geography, history and culture** and enjoy warm and cordial relations, which are attributed to **historical maritime trade linkages**.
- While people-to-people contact between India and Oman can be traced back **5000 years**, **diplomatic relations were established in 1955** and the relationship was upgraded to **Strategic partnership in 2008**. Oman has been a key pillar of **India’s West Asia Policy**.

#### ➤ **Political Relations:**

- Visits at the highest level have been exchanged frequently between India and Oman. Ministerial level visits have taken place regularly.
- The Sultanate of Oman is a **strategic partner of India** in the Gulf and an important interlocutor at the **Gulf Cooperation Council (GCC)**, **Arab League** and **Indian Ocean Rim Association (IORA)** fora.

#### ➤ **Defence Cooperation:**

- The Ministries of Defence of both countries review their relations annually under the aegis of **Joint Military Cooperation Committee** meeting.

Note:

- India and Oman conduct **regular biennial bilateral exercises** between all three services.
  - Army exercise: **Al Najah**
  - Air Force exercise: **Eastern Bridge**
  - Naval Exercise: **Naseem Al Bahr**
- Since 2008, Oman has been extending its support to Indian Navy's **anti-piracy missions** and Indian Naval Ships are regularly welcomed by Oman for **Overseas Deployments**.
- **Economic & Commercial Relations:**
  - India accords a high priority to expanding its economic and commercial ties with Oman. Institutional mechanisms like **Joint Commission Meeting (JCM)** and **Joint Business Council (JBC)** oversee economic cooperation between India and Oman.
  - The bilateral trade and investment between India and Oman remain **robust and buoyant**.
    - India is among Oman's **top trading partners**.
      - For Oman, India was the **3<sup>rd</sup> largest** (after UAE and China) source for its imports and **3<sup>rd</sup> largest market** (after UAE and Saudi Arabia) for its non-oil exports in 2018.
    - Major items of India's **exports to Oman** include mineral fuels, mineral oils and products of their distillation; boilers, machinery and mechanical appliances; articles of iron or steel; electrical machinery and equipment, textiles and garments, chemicals, tea, coffee, spices etc
    - Main items of **India's imports** from Oman include fertilizers; mineral fuels, mineral oils and products of their distillation; bituminous substances etc.
  - Indian financial institutions such as State Bank of India, Public Sector Undertakings such as Air India, Life Insurance Corporation(LIC), have presence in Oman. Indian companies have invested in Oman in sectors like iron and steel, cement, fertilizers, textile etc.
  - **India-Oman Joint Investment Fund (OIJIF)**, a JV between **State Bank of India and State General Reserve Fund (SGRF)** of Oman, a special purpose vehicle to invest in India, has been operational.
  - **Access to Duqm Port:** Oman has allowed India, including its navy, access to its Duqm port, about 550 km south of the capital Muscat. The Port of Duqm SEZ is earmarked to be the Indian Ocean's largest deep-sea port.

- An agreement to **develop Little India, an integrated tourism complex project in Duqm** worth 748 million USD, has been signed between the two countries.
- **Cultural Cooperation:**
  - India and Oman have close cultural relations. The vibrant Indian expatriate community in Oman regularly hosts **cultural performances and invites celebrity artists and singers from India**.
- **Indian Community in Oman:**
  - The large, diverse and highly regarded expatriate Indian community in Oman is spread over the **entire spectrum of professions**. Thousands of Indians are working as doctors, engineers, etc.
  - There are many **Indian schools offering CBSE syllabus** catering to the educational needs of about **45,000** Indian children.

## 47<sup>th</sup> G7 Summit

### Why in News

The **United Kingdom** has invited Indian Prime Minister as a guest to attend the 47<sup>th</sup> **G7 summit** that is scheduled to be held in **June 2021**.

### Key Points

- **Other Guest Countries:**
  - Apart from India, **Australia and South Korea** are also invited to participate in the proceedings of the summit as "**guest countries**".
- **UK, India & G7:**
  - The UK was the first **P5 member** to support a permanent **UN Security Council seat for India** and the first G7 member to invite India to a **G7 Summit in 2005**.
- The proposed summit will be the **first in-person G-7 summit in almost two years**.
- **Objective:**
  - Unite leading democracies to help the world **build back better** from the coronavirus and create a **greener, more prosperous future**.

### Group of Seven (G7)

- **About:**
  - It is an intergovernmental organisation that was formed in **1975**.

Note:



- The bloc **meets annually to discuss issues of common interest like global economic governance, international security and energy policy.**
- The G-7 does not have a formal constitution or a fixed headquarters. The decisions taken by leaders during annual summits are non-binding.
- **Members:**
  - G-7 is a bloc of **industrialized democracies i.e. France, Germany, Italy, the United Kingdom, Japan, the United States, and Canada.**
  - The G7 was known as the 'G8' for several years after the original seven were joined by **Russia in 1997.**
  - The Group returned to being called G7 after Russia was expelled as a member in 2014 following the latter's annexation of the **Crimea region of Ukraine.**
- **Summit Participation:**
  - Summits are held annually and **hosted on a rotation basis** by the group's members.
  - The groundwork for the summit, including matters to be discussed and follow-up meetings, is **done by the "sherpas"**, who are generally personal representatives or members of diplomatic staff such as ambassadors.
  - The leaders of important international organizations like **European Union, IMF, World Bank and the United Nations** are also invited.
- **Challenges and Concerns:**
  - **Policies:**
    - Internally the G7 has a number of disagreements, e.g. clash of the USA with other members over taxes on imports and action on climate change.
    - The organisation has also been **criticised for not reflecting the current state of global politics or economics.**
  - **Not Representative:**

- There are **no G7 members** from Africa, Latin America or the southern hemisphere.
- It is also facing a challenge from fast-growing emerging economies, like **India and Brazil are not members of the G7.**
- However, G-20 was formed in 1999, in response to a felt need to bring more countries on board to address global economic concerns.

#### ➤ **India and G-7**

##### ○ **Previous Participation:**

- The participation of India at the **45<sup>th</sup> summit in Biarritz, France, in August 2019** is a reflection of deepening strategic partnership and recognition of India as a major economic power.
- India was also invited for the 2020 summit **hosted by the USA** which could not take place due to the **pandemic.**
- Previously India had attended the G-8 summit (it became G-7 from G-8 with the expulsion of Russia in 2014) five times between **2005 and 2009.**

##### ○ **Important Platform for Deliberations:**

- India's ability to **safeguard its core sovereign concerns** such as trade, Kashmir issue and India's relations with Russia and Iran can be discussed with G7 members.

##### ○ **Taking on Global Stage:**

- India raised issues on **climate change** and at meetings which **signaled India's growing willingness to lead on issues** that are points of contention for countries like China and the USA.

##### ○ **Significance of India at G7:**

- As current president of **Brazil-Russia-India-China-South Africa (BRICS)** and G20 president in 2023, India will play a **key role driving in multilateral cooperation helping to build back better** around the world.

## Egypt Resumes Severed Relations With Qatar

### *Why in News*

Recently, **Egypt resumed the severed diplomatic and economic ties with Qatar.**

Note:



- Egypt was part of an **Arab quartet** (other members were Saudi Arabia, United Arab Emirates and Bahrain) which had accused Qatar of supporting terrorism and being too close to Iran due to which they had imposed a land, air and naval blockade on Qatar in **2017**.

### Key Points

#### ➤ Reasons for the Re-assumption of Ties:

##### ○ Solidarity and Stability Deal:

- Recently, Gulf states signed a **'solidarity and stability'** deal at the 41<sup>st</sup> **Gulf Cooperation Council (GCC)** summit.
  - **Bahrain, Kuwait, Oman, Qatar, Saudi Arabia and UAE** are the members of GCC.
- In this summit, members of the GCC removed all the sanctions over Qatar and **reopened their land, sea and air borders** to Qatar.
- In solidarity with the Arab quartet (whose three members are in GCC), Egypt too resumed its ties with Qatar.

##### ○ To Unite Against Iran:

- Egypt conciliated with Qatar to strengthen the Gulf region against the threats posed by the **Iranian regime's nuclear and ballistic missile programme** which has always been opposed by the USA and GCC members.

##### ○ Growing Power of Qatar:

- Qatar is one of the **world's largest natural gas producers** and among the countries with **the highest per-capita income**, and is also **host of the 2022 Football World Cup**.
- Under the Government of Mohamad Morsi (2012-13), Qatar was the highest investor in Egypt.

##### ○ Support from USA:

- The United States and Qatar have extensive economic ties. The USA is the largest foreign direct investor and its single largest destination of exports.
- Due to good mutual relations between Qatar and USA, the USA **mediated the solidarity and stability deal** to unite all the gulf countries against Iran which also triggered Egypt's reconciliation.



#### ➤ Reasons For Earlier Discord:

##### ○ Ties with Muslim Brotherhood:

- Post **Arab spring** and the downfall of Mohamad Morsi (former president of Egypt whom Qatar favoured) regime, Qatar supported Muslim Brotherhood in Egypt to secure its influence within that country as well as domestic support from other Islamist groups.
- However, the **Muslim brotherhood were outpowered** by the current regime under **Abdel Fattah el-Sisi** which has allegiance with the Arab quartet.
  - Gulf states monarchs and dictators are against the Islamist movements under Muslim Brotherhood because it aims for **political reforms** that might **threaten their regime**.

##### ○ Independent Foreign Policy Approach:

- In the past, Qatar has long been dominated by Saudi Arabia. Since 1995, Qatar initiated an independent foreign policy approach and established friendly relations not only with other countries such as the USA, Europe, Israel and Iran but also with the **Palestinian**, Hamas and the Islamist parties as well.
- Assumption of such **high-profile roles in regional mediation and cooperation** did not go well with the GCC members and Egypt.

##### ○ Good Relationship with Iran:

- Qatar shares a **huge gas field with Iran**, which is an incentive for it to retain good relations with the Iranian regime.

#### ➤ Significance for India:

- India has good relationships with Egypt as well as all the GCC states including Qatar. Such reconciliation and rapprochement between countries in the region could expand the opportunities for India.
- The Gulf region is one of the **biggest markets for Indian goods** and is the most important supplier of hydrocarbons to its economy. Peaceful relationships between these gas and oil reserve rich states are favourable to **catering to the energy needs of India**.
- The Gulf countries host more than millions of Indian migrants. They are mostly the workers who carry out development activities and they are the prime sources of **remittances** to India.
- Improved mutual relationships with gulf countries and Egypt could provide employment and

Note:



investments opportunities for India in areas such as **food processing**, healthcare, education, culture, defence and security.

## India-Nepal Joint Commission Meet

### Why in News

Recently, the 6<sup>th</sup> India-Nepal Joint Commission meeting was held where in Nepal raised the **Kalapani boundary dispute** with India. The two sides also **discussed cooperation in a range of areas**, including power, oil and gas, water resources, capacity building and tourism among others.

- India distanced itself from discussing the matter at the Joint Commission level as there is a **dedicated Foreign Secretary-level mechanism to discuss boundary disputes**.

### Key Points

- Nepal's requirement for vaccines to fight the **Covid-19** pandemic was discussed as it has approved **Serum Institute of India's (SII) Covishield vaccine**.
- Both the delegations reviewed the development partnership and discussed the benefit of the **Integrated Check Posts (ICP) at Birgunj and Biratnagar** (Nepal). The Posts have helped in seamless movement of people and trade between the two countries.
  - Third and Fourth ICP at Nepalgunj and Bhairahawa respectively to be started.
- India to build **two cultural heritage projects in Nepal** on the '**Pashupatinath Riverfront Development**' and the '**Bhandarkhal Garden Restoration in Patan Durbar**' through grant assistance.
- Nepal's Foreign Minister also delivered a speech in **Indian Council of World Affairs (ICWA)**.
  - The Indian Council of World Affairs was established in **1943 as a think tank**. It is devoted exclusively for the **study of international relations and foreign affairs**. The **Vice President of India** is the **ex-officio President of ICWA**.

### India - Nepal Relations

- **Historical Ties:**
  - Nepal is an important neighbour of India and occupies special significance in its foreign policy

because of the **geographic, historical, cultural and economic linkages/ties that span centuries**.

- India and Nepal share similar ties in terms of **Hinduism and Buddhism** with Buddha's birthplace Lumbini located in present day Nepal.
- The two countries not only share an open border and unhindered movement of people, but they also have **close bonds through marriages and familial ties, popularly known as Roti-Beti ka Rishta**.
- The India-Nepal **Treaty of Peace and Friendship of 1950** forms the bedrock of the special relations that exist between India and Nepal.
- Importance for India can be studied from two different angles: a) **their strategic importance for India's national security**; and b) **their place in India's role perception in international politics**.
- Rivers originating in Nepal feed the **perennial river systems** of India in terms of ecology and **hydropower potential**.

### ➤ Trade and Economy:

- India is Nepal's **largest trade partner** and the **largest source of foreign investments**, besides providing transit for almost the entire third country trade of Nepal.

### ➤ Connectivity:

- Nepal being a landlocked country, it is surrounded by India from three sides and one side is open towards Tibet which has very **limited vehicular access**.
- India-Nepal has undertaken various **connectivity programs** to enhance people-to-people linkages and promote economic growth and development.
  - MOUs have been signed between both the governments for laying electric **rail track linking Kathmandu with Raxaul** in India.
  - India is looking to develop the **inland waterways** for the movement of cargo, within the framework of trade and transit arrangements, providing additional access to sea for Nepal calling it linking **Sagarmatha (Mt. Everest) with Sagar (Indian Ocean)**.

### ➤ Defence Cooperation:

- Bilateral defence cooperation includes assistance to Nepalese Army in its modernization through provision of equipment and training.
- The **Gorkha Regiments** of the Indian Army are raised partly by recruitment from hill districts of Nepal.

Note:

- India from 2011, every year undertakes joint military exercise with Nepal known as **Surya Kiran**.
- **Cultural:**
  - There have been initiatives to promote people-to-people contacts in the area of art & culture, academics and media with different local bodies of Nepal.
  - India has signed three **sister-city agreements** for twinning of **Kathmandu-Varanasi, Lumbini-Bodhgaya and Janakpur-Ayodhya**.
- **Humanitarian Assistance:**
  - Nepal lies in a sensitive ecological fragile zone which is prone to earthquakes, floods causing massive damage to both life and money, whereby it remains the biggest recipient of India's humanitarian assistance.
- **Multilateral Partnership:**
  - India and Nepal share multiple multilateral forums such as **BBIN** (Bangladesh, Bhutan, India, and Nepal), **BIMSTEC** (Bay of Bengal Initiative for Multi Sectoral Technical and Economic Cooperation), **Non Aligned Movement**, and **SAARC** (South Asian Association for Regional Cooperation) etc.
- **Issues & Challenges:**
  - **China's Intervention:**
    - As a landlocked nation, Nepal depended for many years on Indian imports, and India played an active role in Nepal's affairs.
    - However, in recent years, Nepal has **drifted away from India's influence**, and China has gradually filled the space with investments, aid and loans.
    - China considers Nepal a key partner in its **Belt and Road Initiative** (BRI), and wants to **invest in Nepal's infrastructure** as part of its grand plans to boost global trade.
    - Rising Nepal and China cooperation can undermine Nepal's distinction of **buffer state** between India and China.
    - China on the other hand wants to avoid the formation of any **Anti-China stance by the Tibetans living in Nepal**.
  - **Border Dispute:**
    - The **issue erupted in November 2019** when Nepal had released a new political map that

claims **Kalapani, Limpiyadhura and Lipulekh of Uttarakhand as part of Nepal's territory**. The area of **Susta** (West Champaran district, Bihar) can also be noted in the new map.

## Russia Agrees to Extend START Treaty

### Why in News

Recently, Russia approved the extension of the New START treaty. It is the last remaining nuclear Russia-USA arms control treaty which is about to expire in February 2021.

### Key Points

- **About the Approval:**
  - Both houses of Russian Parliament (Kremlin) approved the **extension of the New START treaty for five years**. It was done after a recent telephonic conversation between the **newly elected USA President** and the Russian President.
  - At the **World Economic Forum's** virtual meeting, the President of Russia hailed the decision to extend the treaty as "**a step in the right direction**," but also warned about the rising global rivalries and threats of new conflicts.
  - The pact's extension **doesn't require congressional approval in the USA**, but Russian lawmakers must ratify the move and its President has to sign the relevant Bill into law.
- **The New START Treaty:**
  - **Objective:**
    - It is a treaty between the United States of America and the Russian Federation on measures for the further reduction and limitation of strategic offensive arms.
      - The term 'strategic offensive arms' applies to nuclear warheads **deployed by Strategic Nuclear Delivery Vehicles ('SNDVs')**.
      - **SNDVs are Inter-Continental Ballistic Missiles ('ICBMs')** with a range exceeding 5,500 kilometres, strategic bombers, warships (including strategic submarines) and cruise missiles, including air and sea-launched cruise missiles.

Note:



- **Enforcement:**
  - It came into force on 5<sup>th</sup> February, 2011.
- **Replaced START I Treaty (1991):**
  - New START has replaced the 1991 START I treaty, which expired in December 2009, and superseded the 2002 **Strategic Offensive Reductions Treaty (SORT)**, which terminated when New START entered into force.
  - **The START Framework of 1991** (at the end of the Cold War) limited both sides to 1,600 strategic delivery vehicles and 6,000 warheads.
  - The **May 2002 Strategic Offensive Reductions Treaty (SORT)**, also known as the **Moscow Treaty**, committed the United States and Russia to reduce their deployed strategic nuclear forces to 1,700-2,200 warheads apiece.
- **Limiting Strategic Nuclear Arsenals:** It continues the bipartisan process of verifiably reducing the USA and Russian **strategic nuclear arsenals** by limiting both sides to 700 strategic launchers and 1,550 operational warheads.
- **Renewal:** It was to lapse in February 2021, but after receiving renewal approval from USA and Russia, will be extended for a five-year period.

## Agreement With IEA

### Why in News

India has inked a **Strategic Partnership Agreement** with the **International Energy Agency (IEA)** to strengthen cooperation in global **energy security, stability and sustainability**.

### Key Points

- **Objective:** To encourage and promote strategic and technical cooperation in the energy sector.
- **Benefits:**
  - It will lead to a wider exchange of knowledge and will be a step towards making India a full member of the IEA.
  - Strengthen mutual trust and cooperation & enhance global energy security, stability and sustainability.
  - A phased increase in benefits and responsibilities for India as an IEA strategic partner.
  - Building on existing areas of work and the **Clean**

**Energy Transitions Programme (CETP)**, such as energy security, clean and sustainable energy, energy efficiency, enhancing petroleum storage capacity, expansion of gas-based economy in India etc.

- **Implementation of the Agreement:** IEA Secretariat

### International Energy Agency

- **Established:** In 1974 as per framework of the **Organization for Economic Co-operation and Development (OECD)**. IEA is an autonomous intergovernmental organisation.
- **Need:** Established in the wake of the **oil crisis of 1973-1974**, to help its members respond to major disruptions in oil supply.
- **Mandate:** Over time, the mandate of the IEA has expanded to include tracking and analyzing key global energy trends, promoting sound energy policy and encouraging multinational energy technology cooperation.
- **Mission:** Its mission is to ensure reliable, affordable and clean energy for its member countries and beyond.
- **Areas of Focus:** Its mission is guided by **four main areas (4E's)**:
  - **Energy Security,**
  - **Economic Development,**
  - **Environmental Awareness** and
  - **Engagement Worldwide.**
- **Headquarter (Secretariat):** Paris (France).
- The Governing Board is the main decision-making body of the IEA.
  - It is composed of energy ministers or their senior representatives from each Member country.
- **Members:** It has 30 members at present.
  - A candidate country **must be a member country** of the OECD. But all OECD members are not IEA members.
- **Eligibility for Membership:**
  - Crude oil and/or product reserves equivalent to **90 days of the previous year's net imports**.
    - India **falls short** on the criteria of **Crude oil reserve:** India stores 10 days of the country's crude oil requirements currently, with domestic refiners also maintaining 65 days of crude

Note:



storage. The government is also building **strategic crude oil reserves** to support another 12 days of crude oil needs.

- **Reduce national oil consumption by up to 10%.**
  - Legislation and organisation to operate the **Coordinated Emergency Response Measures (CERM)** on a national basis.
  - Measures in place to ensure the capability of contributing its share of an IEA collective action.
- **Reports:**
- **Global Energy & CO<sub>2</sub> Status Report**
  - **World Energy Outlook**
  - **World Energy Statistics**
  - **World Energy Balances**
  - **Energy Technology Perspectives**

#### **Clean Energy Transitions Programme (CETP)**

- Launched in **November 2017**, the IEA Clean Energy Transitions Programme (CETP) is an effort to accelerate global clean energy transitions.
- The programme provides independent, cutting-edge support to governments in order to catalyze the global transition towards more sustainable energy production and use.
- Priority countries include **Brazil, China, India, Indonesia, Mexico and South Africa**, as well as **other IEA Association countries and key regions such as Southeast Asia, Latin America and Africa.**
- CETP activities include collaborative analytical work, technical cooperation, training and capacity building and strategic dialogues



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Note:



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# Science and Technology

## Highlights

- 5G Technology
- Alternative Anti-Cancer Therapy
- Doppler Weather Radars
- SARS-CoV-2 New Variants
- UV-Bright Stars Spotted in Globular Structure NGC 2808
- Rapid Blood Test to Predict Covid-19 Disease Severity
- Open-RAN Architecture
- PM2.5 and Anaemia

## 5G Technology

### Why in News

Recently, the **Department of Telecommunications (DoT)** has sought inputs from telecom companies and other industry experts on the sale and use of **radio frequency spectrum** over the next 10 years, including the 5G (Fifth Generation) bands.

### Key Points

#### ➤ Features of 5G Technology:

- **Millimeter wave spectrum:** The 5G networks will operate in the **millimeter wave spectrum** (30-300 GHz) which have the advantage of sending large amounts of data at very high speeds because the frequency is so high, it experiences little interference from surrounding signals.
- **Upgraded LTE:** 5G is the latest upgrade in the **long-term evolution** (LTE) mobile broadband networks.
- **Internet speed:** In the high-band spectrum of 5G, internet speeds have been tested to be as high as **20 Gbps** (gigabits per second) as compared to the maximum internet data speed in 4G recorded at 1 Gbps.
  - 5G network speeds should have a **peak data rate** of **20 Gb/s** for the downlink and **10 Gb/s** for the uplink.
- **Bands in 5G:** 5G mainly work in 3 bands, **namely low, mid and high frequency** spectrum — all of which have their own uses as well as limitations.
  - **Low band spectrum:** It has shown great promise in terms of coverage and speed of internet and

data exchange however the maximum speed is **limited to 100 Mbps** (Megabits per second).

- **Mid-band spectrum:** It offers higher speeds compared to the low band, but has limitations in terms of coverage area and penetration of signals.
- **High-band spectrum:** It has the highest speed of all the three bands, but has extremely limited coverage and signal penetration strength.

#### ➤ Hurdles in Rolling Out 5G Technology:

- **Enabling critical infrastructures:** 5G will require a **fundamental change to the core architecture** of the communication system. The major flaw of data transfer using 5G is that it can't carry data over longer distances. Hence, even 5G technology needs to be augmented to enable infrastructure.
- **Financial liability on consumers:** For transition from 4G to 5G technology, one has to upgrade to the latest cellular technology, thereby creating financial liability on consumers.
- **Capital Inadequacy:** Lack of flow of cash and adequate capital with the suitable telecom companies (like Bharti Airtel and Vodafone Idea) is delaying the 5G spectrum allocation.
- **Utility of 5G Applications:** Combined with **IoT**, cloud, **big data**, **AI**, and **edge computing**, 5G could be a critical enabler of the **fourth industrial revolution**.
  - **For India:** 5G networks could improve the accessibility of services such as **mobile banking and healthcare**, and enable exponential growth in opportunities for unemployed or underemployed people to engage in fulfilling and productive work. For this Government has rolled out enabling policies.
- **5G Enabling Policy:**

Note:



- **India's National Digital Communications Policy 2018** highlights the importance of 5G when it states that the convergence of a cluster of revolutionary technologies including 5G, the cloud, Internet of Things (IoT) and data analytics, along with a growing **start-up** community, promise **to accelerate and deepen its digital engagement**, opening up a new horizon of opportunities.
  - It aims to reach 100% teledensity, high-speed internet highways and delivery of citizen-centric services electronically.
- **Global Progress on 5G:**
  - Global telecom companies have already started building 5G networks and rolling it out to their customers in many countries:
    - 5G had been deployed in 50 cities in the United States.
    - South Korea has rolled out 5G to 85 cities.
    - Japan and China have too started 5G mobile service on a trial basis.

## Alternative Anti-Cancer Therapy

### **Why in News**

An **Innovation in Science Pursuit for Inspired Research (INSPIRE)** faculty from the **Department of Science & Technology (DST)** is working on an **Alternative Anti-Cancer Therapy (Anti-Angiogenic)** using **transgenic zebrafish**.

- **INSPIRE** is an **innovative programme** sponsored and managed by the **DST for attraction of talent to Science** and was launched in 2008.
- **Objective** of INSPIRE is **to communicate to the youth of the country the excitements of creative pursuit of science, attract talent to the study of science** at an early age and thus **build the required critical human resource pool** for strengthening and expanding the Science & Technology system and R&D base.

### **Key Points**

- **Angiogenesis:**
  - It is the **physiological process** through which **new blood vessels form from pre-existing vessels**.
  - It is **critical in the growth of cancer** because tumors

need blood supply to grow. Tumors trigger the growth of blood cells by giving off chemical signals that stimulate angiogenesis.

- **Inhibition of tumor angiogenesis** has become a popular **anti-cancer strategy** after chemotherapy.
  - **Angiogenesis inhibitors** are unique cancer-fighting agents because they **block the growth of blood vessels that support tumor growth** rather than blocking the growth of tumor cells themselves.
- **Limitation of Anti-Angiogenic Drugs:**
  - The clinically approved **anti-angiogenic drugs** are ineffective due to **parallel activation of various compensatory mechanisms** involving a cascade of molecules, which **aids tumor angiogenesis** and investigation of these mechanisms are essential for developing anti-angiogenic therapies.
- **Alternative Anti-Cancer Therapy:**
  - Scientists are exploring an alternative anti-cancer therapy that involves **targeting tumor generated formation of new blood vessels** which **allows the delivery of oxygen and nutrients to the body's tissues**.
  - An INSPIRE faculty is exploring the role of **compensatory mechanisms** signaling cues as key targets for cancer therapy.
  - He has also found that **nitric oxide (NO)** plays a **key role in switching off angiogenesis** under tumor microenvironment and that the **melatonin hormone** suppresses tumor angiogenesis.
  - The research has shown that **compensatory mechanisms could be a potential therapeutic target** for developing effective anti-cancer treatment regimes.
- **Transgenic Zebrafish Platform (TZP):**
  - **About:**
    - The INSPIRE faculty is further working to develop **transgenic zebrafish** (which have exogenous genes added to their genome) model by use of the **CRISPR/Cas9 gene-editing tool** to study the compensatory angiogenesis mechanism in tumor microenvironment.
  - **Reason for Using Zebrafish Model:**



Note:

- It has been selected for the study because of its **rapid development, optically transparent, high yield in offspring, and easy techniques for forward and reverse gene manipulation.**

### Cancer

#### ➤ About:

- It is a **large group of diseases** that can start in almost any organ or tissue of the body when **abnormal cells grow uncontrollably**, go beyond their usual boundaries to invade adjoining parts of the body and/or spread to other organs. The latter process is called **metastasizing** and is a major cause of death from cancer.
- A **neoplasm** and **malignant** tumor are other common names for cancer.
- Lung, prostate, colorectal, stomach and liver cancer are the **most common types of cancer in men**, while breast, colorectal, lung, cervical and thyroid cancer are the **most common among women**.

#### ➤ Cancer Burden:

- Cancer remains as one of the **leading causes of adult illness and death** due to chronic and **Non-Communicable Diseases (NCD)** world-over including in India.
- According to the **World Health Organisation (WHO)**, cancer is the **second leading cause of death globally and in 2018**, there were approximately 18 million cases globally, of which 1.5 million were in India alone.

#### ➤ Prevention:

- Between 30% and 50% of cancer deaths could be prevented **by modifying or avoiding the key risk factors**. Key risk factors include **tobacco use, alcohol use, diet, exposure to ultraviolet radiation, pollution, chronic infections, etc.**

#### ➤ Treatment:

- Options include **surgery, cancer medicines and/or radiotherapy**, administered alone or in combination.
- **Palliative care**, which focuses on improving the quality of life of patients and their families, is an essential component of cancer care.

## Doppler Weather Radars

### Why in News

Recently, the Union Minister for Earth Sciences commissioned two of the ten indigenously built **X-Band Doppler Weather Radars (DWR)** which will closely monitor the **weather changes over the Himalayas**.

- A multi-mission meteorological data receiving and processing system developed in collaboration with **Indian Space Research Organisation (ISRO)** was also launched.
  - This new system will **capture, process and make available for use satellite data within seven minutes as opposed to 20 minutes taken by earlier systems.**

### Key Points

- **Developed By** : The DWR has been designed and developed by **ISRO** and manufactured by **Bharat Electronics Limited (BEL)**, Bengaluru.
- **Significance**:
  - Covering the central and western Himalayas, these dual polarised radars will **gather atmospheric variations and pick signals of extreme weather events**.
  - Uttarakhand and Himachal Pradesh are **highly prone to cloud bursts, landslides, heavy rain and snowfall**. Timely weather forecasts and warnings would **ensure the governments make advance plans and initiate rescue measures**.

### Radars

#### ➤ Radar (Radio Detection and Ranging):

- It is a device which **uses electromagnetic waves in the microwaves region** to detect location (range & direction), altitude, intensity and movement of moving and non-moving objects.

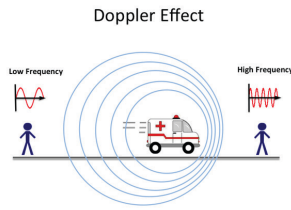
#### ➤ Doppler radar:

- It is a specialized radar that uses the **Doppler effect** to produce velocity data about objects at a distance
  - **Doppler effect**:
    - When the **source and the signal are in relative motion to each other there is a change in the frequency** observed by the observer. If they are **moving closer frequency increases and vice versa**.

Note:

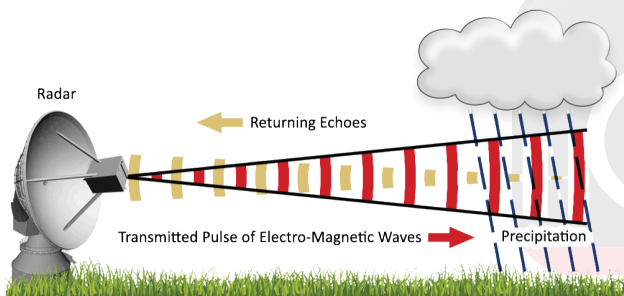


- It does this by **bouncing a microwave signal off a desired target and analyzing how the object's motion has altered the frequency of the returned signal.**
- This **variation gives direct and highly accurate measurements** of the radial component of a target's velocity relative to the radar.



#### ➤ Doppler Weather Radar:

- Based on Doppler principle the radar is **designed to improve precision in long-range weather forecasting and surveillance** using a parabolic dish antenna and a foam sandwich spherical radome.
- DWR has the equipment to **measure rainfall intensity, wind shear and velocity and locate a storm centre and the direction of a tornado or gust front.**



- **Types Of Doppler Radars :** Doppler radar can be divided into several different categories **according to the wavelength which are L, S, C, X, K.**

GHz							
1	2	4	8	12	18	26	40
L	S	C	X	KU	K	KA	
Lower			(Throughput)				Higher
Larger			(Antenna Size)				Smaller
Lower			(Spectrum Band)				Larger
Less			(Susceptibility to rain fading)				More
Frequency Bands							

- **X band radars:** They operate on a wavelength of **2.5-4 cm** and a frequency of **8-12 GHz**. Because of the smaller wavelength, the X band radar is more sensitive and can detect smaller particles.
- **Application:**
  - These radars are used for studies on **cloud development** because they can detect the tiny water particles and also used to detect light precipitation such as snow.

- X band radars also attenuate (become less effective) very easily, so they are used for only very **short range weather observation.**
- Due to the small size of the radar, it can therefore be portable like the Doppler on Wheels (DOW). Most major **airplanes are equipped with an X band radar to pick up turbulence and other weather phenomena.**
- This band is also shared with some **police speed radars and some space radars.**

## SARS-CoV-2 New Variants

### Why in News

**SARS-CoV-2** variants have emerged independently in several countries, and the latest research indicates that the virus is **changing quickly (mutation)** and it may continue to develop towards **evading currently available vaccines.**

- **SARS-CoV-2 virus** is responsible for causing the **coronavirus disease (Covid-19).**

### Key Points

#### ➤ Meaning of Mutation:

- Mutation is **an alteration in the genetic material (the genome) of a cell** of a living organism or of a virus that is more or less permanent and that can be transmitted to the cell's or the virus's descendants.
- The genomes of organisms are all composed of **Deoxyribonucleic Acid (DNA)**, whereas **viral genomes** can be of DNA or **Ribo Nucleic Acid (RNA)**.

#### ➤ RNA Mutation vs DNA Mutation:

- When cells multiply, the DNA within them **replicates** as well, to make **copies for the new cells**. During replication, **random errors** are introduced into the new DNA.
- While the errors in DNA virus genomes can be **corrected by the error-correcting function of cells in which they replicate**, there are **no enzymes in cells to correct RNA errors**. Therefore, **RNA viruses accumulate more genetic changes (mutations) than DNA viruses.**

#### ➤ Significance of Mutation:

- **Evolution:**
  - While **most mutations are deleterious to the virus**, if some allow a selective advantage, say

Note:

**better infectivity, transmission, or escape from immunity** than the new viruses out-compete the older ones in a population.

- **For example:** A mutation called **D614G** emerged in January 2020 to change the **amino acid** at a position in the **coronavirus' Spike protein**.
  - Because this variant infected and replicated better and produced **'fitter' viruses**, it now accounts for over 99% of the virus circulating globally. Other mutations are now emerging in this background.
  - It is the **coronavirus spike protein** that binds to a **human protein** to initiate the **process of infection**.
  - Changes here could **possibly affect how the virus behaves in terms of its ability to infect**, or cause severe disease, or escape the immune response made by vaccines.

#### ➤ **Distinct features of RNA Genome of Coronavirus:**

- Coronaviruses have an RNA genome with two unique features:
  - **Largest Genome:**
    - At 30,000 nucleotides (nucleic acid units) they have the **largest genome among RNA viruses**.
  - **Stability:**
    - Coronaviruses have rather stable genomes, changing about a **thousand times slower than influenza viruses**, which too are RNA viruses that cause respiratory illness.

#### ➤ **Recent RBD Mutations in Coronavirus Variants:**

- Three key **Receptor-Binding Domain (RBD)** mutations **K417N/T, E484K, and N501Y** are found in variants that emerged in **South Africa and Brazil**.
  - The **UK variant** has the **N501Y, P681H** mutation.
- Viruses with mutations within the receptor-binding domain (RBD) of the Spike protein **have the most potential to evade antibodies** that develop as a result of natural infection or vaccination.
- The RBD binds the cellular receptor allowing the virus to infect cells, and anti-RBD antibodies neutralise the virus.

#### ➤ **Vaccine Test Against Emerging Variants:**

- Indirect tests are done in laboratories to assess if an emerging variant might escape antibodies developed after a natural infection or vaccination.

- **Serum** (the blood components that contain antibodies) from recovered patients or vaccinated people, and **antibodies known to neutralise the original virus**, are tested to determine whether the variant viruses evade antibodies.
- The effectiveness of a serum or antibody is expressed as an **inhibitory concentration (IC) or plaque reduction neutralisation titer (PRNT) value**.
- The IC50 or PRNT50 value is the reciprocal dilution of serum or antibody that neutralises 50% viruses in the sample.

#### ➤ **Efficacy of Vaccine Against Emerging Variants:**

- Both Moderna and Pfizer/BioNTech have agreed that their vaccines offered **reduced protection against the South African variant**. The two companies are reported to be working on **developing fresh vaccines** to cover these variants.
- There is also proof of **several re-infections** with the variant in South Africa, driven by the ability of new variants to evade immunity developed against the original virus.

#### ➤ **India's Case:**

- Only the UK variant viruses have so far **been reported from India** and that too, in travellers. There is **no reported local transmission**.
- The evidence so far suggests that current vaccines would still **protect against the UK variant, even if with reduced efficacy**.
  - Scientists from **ICMR-National Institute of Virology** and **Bharat Biotech** tested serum from recipients of their vaccine, **Covaxin**, against a UK variant.
  - The results show no significant difference, suggesting that the vaccine would work equally well on the UK variant.
- With cases already going down, India should **strictly implement masks and limit crowds while aggressively tracing contacts of people infected with the UK variant**.
- India must also be vigilant of people with a history of travel to **South Africa since October 2020, and Brazil since December 2020**.
- The setting up of an **inter-ministerial group** 'Indian SARS-CoV-2 Genomics Consortium (INSACOG)' to **increase genomic surveillance** is a step in the right direction.

Note:

- **Genomic surveillance** can generate a rich source of information for tracking pathogen transmission and evolution on both national and international levels.

## UV-Bright Stars Spotted in Globular Structure NGC 2808

### Why in News

Recently, astronomers have spotted rare hot **Ultra Violet (UV)-bright stars** in the **massive intriguing globular cluster** in the **Milky Way Galaxy** called **NGC 2808**.

- **India's first multi-wavelength space satellite AstroSat** helped astronomers in this.

### Key Points

- **Data:**
  - Scientists combined data of **Ultraviolet Imaging Telescope (on board AstroSat)** with observations made using other space missions such as the **Hubble Space Telescope** and the **Gaia telescope** along with **ground-based optical observations**.
  - **Hubble Space Telescope:** The HST or Hubble (NASA) is a space telescope that was launched into **Low Earth orbit** in 1990 and remains in operation. It is one of the **largest and most versatile space telescopes** till date.
  - **Gaia** is a space observatory of the **European Space Agency**, launched in **2013 and expected to operate until 2022**. The spacecraft is designed for astrometry: measuring the positions, distances and motions of stars with unprecedented precision.
- **Findings:**
  - About **34 UV-bright stars** were found to be members of the globular cluster (NGC 2808). One of the UV-bright stars was found to be about **3000 times brighter** than the Sun with a surface temperature of about **1,00,000 K**.
  - **Hot UV-bright stars** have been distinguished from the **relatively cooler red giant and main-sequence stars**.
  - Most of the stars were found to have evolved from a solar stage called the **horizontal branch stars** with hardly any outer envelope. Thus, they were bound to skip the last major phase of life

called the **asymptotic giant phase (it is one of the last major phases in the life of stars)** and directly become dead remnants or **white dwarfs**.

- The **horizontal branch (HB)** is a stage of stellar evolution that immediately follows the **red giant branch** in stars.

### ➤ Significance:

- **Properties of Stars:** The findings will help in determining properties of these stars such as their surface temperatures, luminosities and radii.
- **Evolution of Stars:** These present **excellent laboratories** where astronomers can understand **how stars evolve through various phases** between their birth and death.
  - **Death of star:** It is not clear how these stars end their lives as not many of them are detected in these fast-evolving phases, making their study crucial.
  - **UV radiations:** UV-bright stars are speculated to be the reason for the ultraviolet radiation coming from old stellar systems.

### ➤ About NGC 2808:

- NGC 2808 is a **globular cluster in the constellation Carina**. The cluster belongs to the **Milky Way**, and is one of our home galaxy's **most massive clusters**, millions of stars. It is estimated to be 12.5-billion years old.
- It is said to have at least **five generations of stars**.

### Stellar Evolution

#### ➤ Nebula:

- A nebula is a cloud of gas (mostly hydrogen and helium) and dust in space.
- Nebulae are the birthplaces of stars.

#### ➤ Main Sequence Stars:

- Main sequence stars are stars that are fusing hydrogen atoms to form helium atoms in their cores.
- Most of the stars in the universe i.e. about 90% of them are main sequence stars. The **sun** is a main sequence star.
- Towards the end of its life, a star like the Sun **swells up into a red giant**, before losing its **outer layers** as a **planetary nebula and finally shrinking to become a white dwarf**.

#### ➤ Red Dwarf:

Note:



- The **faintest (less than 1/1000th the brightness of the Sun) main sequence stars** are called the red dwarfs.
- **Proxima Centauri**, the nearest star to the Sun, is a red dwarf.

#### ➤ Red Giant:

- Red giants have diameters between 10 and 100 times that of the Sun.
- They are very bright, although their surface temperature is lower than that of the Sun.
- A red giant is formed during the **later stages of the evolution as it runs out of hydrogen fuel at its centre.**
- A very large red giant is often called **Red Supergiant.**

#### ➤ Planetary Nebula:

- Planetary nebula is an outer layer of gas and dust that are lost **when the star changes from a red giant to a white dwarf.**

#### ➤ White Dwarf:

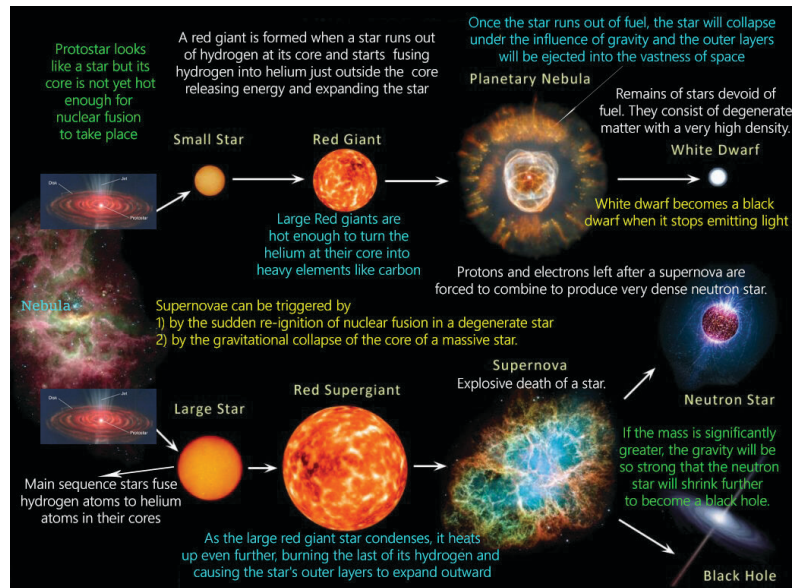
- A white dwarf is a **very small, hot star, the last stage in the life cycle of a star.**
- White dwarfs are the remains of normal stars, whose nuclear energy supplies **have been used up.**
- White dwarf consists of degenerate matter with a **very high density** due to gravitational effects.

#### ➤ Nova:

- Novae occur on the surface of a **white dwarf** in a binary system.
- If the two stars of the system are sufficiently near to one another, material (hydrogen) can be pulled from the companion star's surface onto the white dwarf.
- When enough material builds up on the surface of the white dwarf, it triggers a nuclear fusion on a white dwarf which causes a **sudden brightening of the star.**

#### ➤ Supernova:

- A supernova is the **explosive death of a star** and often results in the star obtaining the brightness of **100 million suns for a short time.**
- The extremely luminous burst of radiation expels much or all of a **star's material at a great velocity**, driving a shock wave into the surrounding interstellar medium.



- These shock waves trigger condensation which is a nebula paving the way for the birth of a new star.

- A **neutron star** is the **collapsed core of a massive supergiant star.**

#### AstroSat

- It is a **multi-wavelength astronomy mission** on an IRS-class (Indian Remote Sensing-Class) satellite in a **650-km, near-equatorial orbit.**
- **Launch:** It was launched by the Indian launch vehicle **PSLV** from Satish Dhawan Space Centre, Sriharikota in 2015 by ISRO.
- It is the **first dedicated Indian astronomy mission aimed at studying celestial sources in X-ray, optical and UV spectral bands** simultaneously with its five unique X-ray and ultraviolet telescopes working in tandem.
- One of the unique features of AstroSat mission is that it enables the **simultaneous multi-wavelength observations** of various astronomical objects with a single satellite.
- The Ground Command and Control Centre for ASTROSAT is located at **ISRO Telemetry, Tracking and Command Network (ISTRAC), Bangalore, India.**
- This has put India in an exclusive club of countries which have multi wavelength space observatories.
- The minimum life of the AstroSat mission was expected to be **5 years.**

Note:



## Rapid Blood Test to Predict Covid-19 Disease Severity

### Why in News

Scientists at **Washington University School of Medicine in St Louis (WUSTL)** have published a paper showing that a **relatively simple and rapid blood test** can **predict which Covid-19 patients are at highest risk of severe complications** or death.

### Key Points

#### ➤ About the Blood Test:

- It **measures levels of mitochondrial DNA**, a unique type of DNA molecule that normally resides inside the energy factories of cells.
- Mitochondrial DNA spilling out of cells and into the bloodstream is **a sign that a particular type of violent cell death** is taking place in the body.

#### ➤ Study Conducted:

- The team **evaluated 97 patients with Covid-19**, measuring their mitochondrial DNA levels on the first day of their hospital stay.
- They found that **mitochondrial DNA levels were much higher in patients who eventually were admitted to the ICU**, incubated or died.
  - This association was **independent of a patient's age, sex and underlying health conditions**.

#### ➤ Significance:

- The test **could serve as a way to predict disease severity** as well as a tool to **better design clinical trials**, identifying patients who might, for example, benefit from specific investigational treatments.
- The test **could serve as a way to monitor the effectiveness of new therapies**. Presumably, effective treatments would lower mitochondrial DNA levels.
- Further, the test **predicted outcomes as well as or better than existing markers of inflammation** currently measured in Covid patients.
  - Most other markers of inflammation measured in patients with Covid-19, including those still under investigation, are **general markers of systemic inflammation, rather than inflammation specific to cell death**.

- **Inflammation is the body's innate response to injury or infection** (including trauma, surgery, burns, and cancer).
  - Certain proteins are released into the bloodstream during inflammation; if their concentrations increase or decrease by at least 25%, they can be used as systemic inflammatory markers.

### Mitochondrial DNA

- It is the **small circular chromosome found inside mitochondria**.
  - The mitochondria are **organelles found in cells that are the sites of energy production**. They **produce cellular energy** in the form of **adenosine triphosphate (ATP)**, hence they are called '**power houses**' of the cell. The mitochondria **divide by fission**.
- It is **different in a way from the DNA (Deoxyribonucleic Acid) that's in the nucleus**.
  - Mitochondrial DNA is **small and circular**. It has **only 16,500 or so base pairs** in it. It encodes different proteins that are specific for the mitochondrial.
  - The **nuclear genome is linear** and is made of **3.3 billion DNA base pairs**.
  - The mitochondrial genome is **not enveloped**, and it is **not packaged into chromatin**.
  - **Mitochondrial DNA**, unlike nuclear DNA, is **inherited from the mother**, while nuclear DNA is inherited from both parents.
- If there's a **defect in some of those mitochondrial DNA bases**, that is to say a **mutation**, one will have a **mitochondrial disease**, which will involve the inability to produce sufficient energy in things like the muscle and the brain, and the kidney.

## Open-RAN Architecture

### Why in News

Recently, **Telecom Regulatory Authority of India (TRAI)** Chairman said that use of **Open-RAN (Radio Access Network)** and software defined telecom networks will open new opportunities for Indian entities to enter into the network equipment market.

Note:



### Key Points

#### ➤ About:

- **Open-RAN** is not a technology, but rather an **ongoing shift in mobile network architecture** that allows networks to be built using subcomponents from a variety of vendors.
  - O-RAN has an **open, multi-vendor architecture** for deploying mobile networks, as **opposed to the single-vendor proprietary architecture**.
  - O-RAN **uses software to make hardware manufactured by different companies work together**.
- The key concept of Open RAN is **“opening” the protocols and interfaces between the various subcomponents** (radios, hardware and software) **in the RAN**.
  - **Radio Access Network (RAN):**
    - It is the **part of a telecommunications system** that connects individual devices to other parts of a network through radio connections.
    - A RAN resides between user equipment, such as a mobile phone, a computer or any remotely controlled machine, and **provides the connection with its core network**.
- As a technical matter this is what the industry refers to as a **disaggregated RAN**.

#### ➤ Elements of RAN:

- **The Radio Unit (RU)** is where the radio frequency signals are transmitted, received, amplified and digitized. The RU is located near, or integrated into, the antenna.
- **The Distributed Unit (DU)** is where the real-time, baseband processing functions reside. The DU can be centralized or located near the cell site.
- **The Centralized Unit (CU)** is where the less time-sensitive packet processing functions typically reside.

#### ➤ Functioning of Open RAN:

- It is the interface between the **RU, DU and the CU that are the main focus of Open RAN**.
- By **opening and standardizing these interfaces** (among others in the network), and incentivizing implementation of the same, **networks can be deployed with a more modular design** without being dependent upon a single vendor.
- Making these changes can also allow the DU and CU to be run as virtualized software functions on **vendor-neutral hardware**.

#### ➤ Traditional RAN:

- In a traditional RAN system, **the radio, hardware and software are proprietary**.
  - This means that nearly **all of the equipment comes from one supplier** and that operators are unable to, for example, deploy a network using radios from one vendor with hardware and software from another vendor.
- **Problems:**
  - Mixing and matching cell sites from different providers typically leads to a **performance reduction**.
  - The result is that most network operators, while supporting multiple RAN vendors, will deploy networks using a single vendor in a geographic region which can create vendor lock-in with high **barriers to entry for new innovators**.

#### ➤ Advantage of O-RAN:

##### ○ Innovation and Options:

- An open environment expands the ecosystem, and with more vendors providing the building blocks, there is more innovation and more options for the Operators. They can also add new services.

##### ○ New Opportunities:

- It will open new opportunities for Indian entities to enter into the network equipment market.

##### ○ Cost Saving:

- The benefits of this approach also include increased network agility and flexibility, and cost savings.
- It's expected to make **5G** more flexible and cost efficient.

## PM2.5 and Anaemia

### *Why in News*

A recent study by IIT delhi has tried to establish the **association between ambient PM 2.5 exposure and occurrence of anaemia among children under the age of 5 years of age in India**.

- PM2.5 refers to particles that have diameter **less than 2.5 micrometres** (more than 100 times thinner than a human hair) and remain suspended for longer.

Note:

- These particles are formed as a result of **burning fuel and chemical reactions** that take place in the atmosphere. Natural processes such as **forest fires** also contribute to PM2.5 in the air. These particles are also the primary reason for occurrence of smog.

### Key Points

#### ➤ Findings

- Extended periods of exposure to PM 2.5 can lead to anaemia among children under the age of 5 years. About 63% of the included children were found to be anaemic.

#### ○ Children at Risk:

- **Young Children:** Children with lower age had higher vulnerability of being anaemic.
- **Poverty :** Children from lower wealth index levels had higher percentages of anaemia.
- **Maternal Anaemia:** Children born to anaemic women have higher chances of developing anaemia.

#### ○ Intensity:

- Higher PM2.5 levels exposure, decreases the average haemoglobin levels in children.

#### ○ Significance:

- The study is important because so far anaemia has been looked at through the prism of **nutrition deficiency**, specifically that of iron.
- Exposure to air pollution, especially PM 2.5, has been shown to induce systemic inflammation.
  - Inflammation refers to the body's process of fighting against things that harm it, such as infections, injuries, and toxins, in an attempt to heal itself.
  - Over time, chronic inflammation may have a negative impact on tissues and organs.

- **Current Scenario:** According to the **India National Family and Health Survey 2015–2016 (NFHS-4)**, 53.1% of women in India with 15–49 years of age and 58.5 % of children under five were anaemic.
  - A '**Lancet Global Health report**' also revealed that **23% of Indian men suffer from anaemia**.

### Anaemia


- The **World Health Organization (WHO)** defines anaemia

as a condition in which the **number of red blood cells** or their oxygen-carrying capacity is insufficient to meet physiological needs.

### WAYS TO TACKLE ANAEMIA

**CAUSES**

- Iron and nutritional deficiency
- Blood loss during menstruation
- Worm infections of the intestine
- Chronic kidney ailments, hypothyroidism and endocrine abnormalities
- Body unable to absorb iron due to medical reasons



**SYMPTOMS**

Weakness, fatigue, shortness of breath, giddiness, headache, Increased heart-beat, pale and dry skin and irritation in mood.

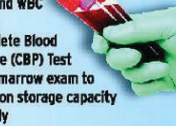
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**TREATMENT FOR ANAEMIA**

Proper balanced diet. Vegetables rich in iron include spinach, carrots, radish, beetroots, tomatoes, potatoes and green leafy vegetables. Fruits like bananas, apples, pomegranate, sapota.

Iron supplements only under medical advice.

In some cases, blood transfusion.



**HOW TO DIAGNOSE**

- Blood tests to detect the blood components
- RBC and WBC count
- Complete Blood Picture (CBP) Test
- Bone marrow exam to find iron storage capacity of body

- **Causes:** Iron deficiency is the most common cause of anaemia, although other conditions, such as **folate, vitamin B12 and vitamin A deficiencies, chronic inflammation, parasitic infections, and inherited disorders can all cause anaemia**.
- **Symptoms:** In its severe form, it is associated with fatigue, weakness, dizziness and drowsiness. Pregnant women and children are particularly vulnerable.
- **Government Programmes Related to Anaemia:**
  - In 2018, the government of India launched **Anaemia Mukh Bharat (AMB)** as part of the **Intensified National Iron Plus Initiative (NIPI)** Program for accelerating the annual rate of decline of anaemia from one to three percentage points.
  - The target groups for AMB are Children (6-59 months, 5-9 years), Adolescent Girls & Boys (10-19 years), Women of Reproductive Age (15-49 years), Pregnant Women and Lactating Mothers.
  - The Ministry of Health and Family Welfare has also launched the **Weekly Iron and Folic Acid Supplementation (WIFS) Programme** to meet the challenge of high prevalence and incidence of anaemia amongst adolescent girls and boys.
  - Other programmes include **Integrated Child Development Scheme (ICDS)**, **National Nutritional Anemia Control Program (NNACP)**, etc to combat anaemia.



Note:

# Environment and Ecology

## Highlights

- Kanha Tiger Reserve
- Environment vs Development Debate
- India's Draft Arctic Policy
- Bio Medical Waste
- Carbon Sequestration
- Adaptation Gap Report 2020: UNEP
- Nagi-Nakti Bird Sanctuaries
- Indian Star Tortoise
- Green Tax
- Electronic Waste Management
- Bandipur Tiger Reserve
- Nilgiri Elephant Corridor Case

## Kanha Tiger Reserve

### Why in News

A tigress was found dead in the **buffer zone of Kanha tiger reserve in Madhya Pradesh.**

### Key Points

- **Location:** It stretches over an area of 940 square km in the **two districts - Mandla and Balaghat - of Madhya Pradesh.**
- **History:** The present-day Kanha area **was divided into two sanctuaries, Hallon and Banjar. Kanha National Park was created in 1955** and in **1973** was made the **Kanha Tiger Reserve.**
  - Kanha National Park is the **largest National Park in Central India.**
- **Features:**
  - **Fauna:**
    - The **State animal of Madhya Pradesh - Hard Ground Barasingha (Swamp deer or *Rucervus duvaucelii*)** is found **exclusively** in Kanha Tiger Reserve.
    - Other Species found include **Tiger**, Leopard, Dhole, Bear, **Gaur** and Indian Python etc.
  - **Flora:**
    - It is best known for its evergreen **Sal forests (*Shorea Robusta*).**
  - It is the **first tiger reserve in India to officially introduce a mascot, "Bhoorsingh the Barasingha".**
- **Other Tiger Reserves in Madhya Pradesh:**

- Sanjay-Dubri.
- **Panna.**
- **Satpura.**
- **Bandhavgarh.**
- **Pench.**

### Core and Buffer Zone

- For the purpose of management, tiger reserves are constituted on a 'core – buffer' strategy.
- In **core areas**, forestry operations, collection of minor forest produce, grazing, human settlement and other biotic disturbances are not allowed and are singularly **oriented towards conservation.**
- The **buffer zone** is managed as a 'multiple use area' with conservation oriented land use, having the twin objectives of providing habitat supplement to the spillover population of wild animals from the core, apart from facilitating site specific eco developmental inputs to stakeholder communities.

### Barasingha

- **Subspecies:** There are **three subspecies of swamp deer** found in the Indian Subcontinent.
  - The **western swamp deer (*Rucervus duvaucelii*)** found in **Nepal,**
  - **Southern swamp deer / Hard Ground Barasingha (*Rucervus duvaucelii branderi*)** found in **central and north India** and
  - **Eastern swamp deer (*Rucervus duvaucelii ranjitsinhi*)** found in the **Kaziranga (Assam) and Dudhwa National Parks (Uttar Pradesh).**



Note:



- **Protection Status of Swamp Deer:**
  - **IUCN Red List:** Vulnerable
  - **CITES:** Appendix I
  - **Wildlife Protection Act, 1972:** Schedule I

## Environment vs Development Debate

### Why in News

Recently, the **National Highways Authority of India (NHAI)** in the Karnataka High Court claimed that the **Environment Protection Act, 1986** was passed by Parliament not only for protection of environment but also at the instance of foreign powers.

### Key Points

- **Background:**
  - A **writ petition** filed by the NGO, **United Conservation Movement**, against a 2013 notification of the Union Environment Ministry doing away with environment impact assessment reports for **widening national highways of over 100 km by more than 40 metres**.
    - **The United Conservation Movement** is a conglomeration of environmental groups, and has over the last couple of years challenged NHAI projects in the **Western Ghats**, a tiger reserve as well as construction activity in a wildlife reserve.
- **NHAI's Claim:**
  - NHAI also alleged that many **NGOs file petitions** for upholding the norms of the Act **at the instance of foreign powers**.
    - Foreign entities such as **Amnesty International** and **Peoples Union for Civil liberties** through its Indian counterparts have filed **Writ** Petitions under **Article 32** of the Constitution of India.
      - **Article 32 of the Constitution (Right to Constitutional Remedies):** It is a fundamental right, which states that individuals have the right to approach **the Supreme Court (SC)** seeking enforcement of other fundamental rights recognised by the Constitution.
  - The submission alleges that **many organisations in India**, which function as environmental action and human rights, **are actively involved in attacking**

**development projects, and challenging the government policies & notifications and doing anti national activities.**

- The Environment Protection Act, 1986 is an Act that was **influenced by the United Nations Conference on the Human Environment held at Stockholm in June, 1972 (Stockholm Conference)**.
  - Hence, the Act has been passed by Parliament not only for protection of the environment but also at the instance of foreign powers.
- **Court's Ruling:**
  - The High Court has **directed the NHAI chairman to nominate a very senior officer to look into and inquire into the manner** in which the statement of objections was filed.
  - The High Court has also **asked the NGO, United Conservation Movement, to provide details of its constitution and activities carried out in environment and conservation.**

### Development vs Environment

- **Importance of Environment:**
  - The economic significance of the environment is evident with the range of **ecosystem services** that it offers. These include:
    - **Provisioning services** (food, irrigation, drinking water).
    - **Regulating services** (climate regulation, water quality regulation).
    - **Cultural services** (recreational and religious services).
    - **Supporting services** (nutrient recycling, soil formation).
  - Millions of households and **developmental activities utilise these ecosystem services** for production and consumption.
- **Relation of Environment with Development:**
  - Rapid **industrialisation and urbanisation** are **inevitable** to bring in desired levels of economic development.
  - This is also believed to be **essential to substantially increase the per capita income**.
  - However, these income-generating activities are sure to have **negative environmental consequences such as pollution**.

Note:

- Noticeably, **environmental quality is being compromised** for the goals of mass employment generation and poverty reduction.
- It is believed that **with gradual increase in income levels** along with growth in financial and technological capabilities, **environmental quality could be restored**.
- But the reality is that the continued **growth generating activities only increasingly deteriorates the environmental quality**.

➤ **Developmental Factors Affecting Environmental Sustainability:**

- **Lack of Environmental Compliance:**
  - Neglect of environmental principles is a key reason why **natural hazards** end up causing a significant number of avoidable casualties.
  - Any exercise to scientifically ascertain the risk from natural hazards to a region are barely implemented in the right spirit.
  - **Unregulated quarrying and the unscientific cutting of slopes** into hills aggravates the risk of soil erosion and subsequently increases the risk of landslides.
- **Ill-effects of Subsidies:**
  - In pursuit of providing welfare to vulnerable sections of society, the government has provided a **bulk of subsidies**.
  - However, **subsidised nature of services** like energy and electricity **leads to their overuse and undermines environmental sustainability**.
  - Further, subsidies also undermine the revenue base and limit the government's capacity to invest in new, cleaner technologies.
- **No Cost to Environmental Resources:**
  - **Access to natural resources is entirely open** and no individual user bears the full cost of environmental degradation and **resources are consequently overused**.
- **Complexity of Population Dynamics:**
  - Increasing population tends to **exacerbate the linkages between underdevelopment and environmental degradation**.
  - Further, **poverty generates significant incentives to raise large families** and stimulate migrations, which **makes urban areas environmentally unsustainable**.

- Both outcomes increase pressure on resources and consequently worsen environmental quality, diminish productivity and reinforce poverty.

## India's Draft Arctic Policy

### Why in News

Recently, India drafted a **new Arctic policy** that aims at expanding scientific research, sustainable tourism and **exploration of mineral oil and gas** in the Arctic region.

### Key Points

➤ **About the Policy:**

- **Nodal Body:** India has designated Goa-based **National Centre for Polar and Ocean Research** to lead scientific research and act as a nodal body to coordinate among various scientific bodies to promote domestic scientific research capacities in the Arctic.
- **Objectives:**
  - **Promoting Scientific Study of Arctic:** Orient the curriculum on earth sciences, biological sciences, geosciences, climate change and space related programmes with Arctic imperatives in Indian Universities.
  - **Planning Explorations:** Formulating effective plans for Arctic related programmes for mineral/oil and gas exploration in petroleum research institutes
  - **Promoting Arctic Tourism:** Encouraging tourism and hospitality sectors by building specialised capacities and awareness by engaging with Arctic enterprises.

➤ **About Arctic:**

- The Arctic is a **polar region** located at the northernmost part of Earth.
- The Arctic consists of the Arctic Ocean, adjacent seas, and parts of Alaska (United States), Canada, Finland, Greenland (Denmark), Iceland, Norway, Russia, and Sweden.
- Land within the Arctic region has seasonally varying snow and ice cover.



Note:

➤ **Ecological Impact of Warming on Arctic:**

- **Rising Sea Levels:** The loss of ice and the warming waters affects sea levels, salinity levels, and current and precipitation patterns.
- **Deterioration of Tundra:** The Tundra is returning to swamp, the **permafrost** is thawing, sudden storms are ravaging coastlines and **wildfires** are devastating interior Canada and Russia.
  - **Tundra:** Found in regions north of the Arctic Circle and south of the Antarctic Circle. These are **treeless regions**.
- **Threat to Biodiversity:** The phenomenally rich biodiversity of the Arctic region is under serious threat.
  - The absence of year-long ice and higher temperatures are making the survival of Arctic marine life, plants and birds difficult while encouraging species from lower latitudes to move north.
- **Extinction of Indigenous Cultures:** The Arctic is also home to about 40 different indigenous groups, whose culture, economy and way of life is in danger of being swept away.
  - Increasing human encroachment with its attendant stresses will only aggravate this impact and upset a fragile balance.

➤ **Commercial Importance of Arctic:**

- **Abundant Resources:** The opening of the Arctic presents huge commercial and economic opportunities, particularly in shipping, energy, fisheries and mineral resources.
- **Commercial Navigation:**
  - **The Northern Sea Route (NSR):** It is a shipping lane connecting the North Atlantic to the North Pacific through a short polar arc which could revolutionise the prospects of trade in Russia and Scandinavian countries.
  - It is approx 40% shorter than via the Suez Canal or 60% shorter via the Cape of Good Hope.
  - It would cause substantial reductions in transportation time, fuel consumption, limit environmental emission and eliminate piracy risk.
- **Oil and Natural Gas Deposits:**
  - Estimated to be 22% of the world's unexplored resources, mostly in the Arctic ocean, will be open to access along with mineral deposits

including 25% of the global reserves of rare earths, buried in Greenland.

➤ **Issues Involved:**

- Navigation conditions are dangerous and restricted to the summer.
- Lack of deep-water ports, a need for ice-breakers, shortage of workers trained for polar conditions, and high insurance costs add to the difficulties.
- Mining and deep-sea drilling carry massive costs and environmental risks.
- Unlike **Antarctica**, the Arctic is not a global common and there is no overarching treaty that governs it.

➤ **Conflict over Arctic:**

- Russia, Canada, Norway and Denmark have put in **overlapping claims for extended continental shelves**, and the right to sea-bed resources.
- Russia is the dominant power, with the longest Arctic coastline, half the Arctic population, and a full-fledged strategic policy.
  - Claiming that the NSR falls within its territorial waters, Russia anticipates huge dividends from commercial traffic including through the use of its ports, pilots and ice-breakers.
  - Russia has also activated its northern military bases, refurbished its nuclear armed submarine fleet and demonstrated its capabilities, including through an exercise with China in the eastern Arctic.
- China, playing for economic advantage, has moved in fast, projecting the **Polar Silk Road** as an extension of the **Belt and Road Initiatives**, and has invested heavily in ports, energy, undersea infrastructure and mining projects.
- **India's Interests in Arctic:**
  - **Environmental Interest:**
    - India's extensive coastline makes it vulnerable to the impact of Arctic warming on ocean currents, weather patterns, fisheries and most importantly, the **monsoon**.
    - Arctic research will help India's scientific community to study melting rates of the Himalayan glaciers, which are endowed with the largest freshwater reserves in the world outside the geographic poles.
  - **Scientific Interest:**
    - **Research Stations:** India launched its first

Note:

scientific expedition to the Arctic in 2007 and set up a research station 'Himadri' in the international Arctic research base at Ny-Ålesund in Spitsbergen, Svalbard, Norway.

- India has two other observatories in **Kongsfjorden and Grønvatnet** in Norway.
- **Studying Himalayan Glaciers:** Scientific research in Arctic developments, in which India has a good record, will contribute to its understanding of climatic changes in the third Pole, the Himalayas.
- **Strategic Interest:**
  - **Countering Chinese Influence:** The strategic implications of an active China in the Arctic and its growing economic and strategic relationship with Russia are self-evident and need close monitoring.
  - **Arctic Council Membership:** Since 2013, India has had observer status in the **Arctic Council**, which is the predominant inter-governmental forum for cooperation on the environmental and development aspects of the Arctic.

## Bio Medical Waste

### Why in News

The **National Green Tribunal** (NGT) has recently directed various authorities to ensure compliance from the **biomedical waste management facilities** in the country.

### Key Points

- **Central Level:** The **Central Pollution Control Board (CPCB)** to ensure strict compliance of biomedical waste management rules and scientific disposal of the waste.
- **State Level:** The Chief Secretaries of all the States/UTs to oversee compliance and ensure that authorisation is secured by every health care facility in their respective jurisdiction and also there is adherence to the norms.
- **District Level:** The District Magistrates in accordance with the District Environmental Plans.
- **Groundwater Contamination:** While permitting deep burials, it may be ensured that groundwater contamination does not take place.
- **Segregation:** Ensure that hazardous bio-medical waste is not mixed with the general waste.

- **Frequent Violation of Rules:** The direction came as a result of regular fines being imposed on various healthcare facilities and biomedical waste treatment facilities.
- **Earlier Observation:** The segregation of **Covid-19 bio-medical waste** from general garbage is a must to avoid further contamination adversely affecting public health.

### Bio-Medical Waste Management Rules, 2016

- **Definition:** Biomedical waste is defined as **human and animal anatomical waste, treatment apparatus like needles, syringes and other materials used in health care facilities** in the process of treatment and research.
  - **Objective:** The objective of the rules is to **properly manage** the per day bio-medical waste from **Healthcare Facilities (HCFs)** across the country.
  - **Ambit:** The ambit of the rules has been expanded to include **vaccination camps, blood donation camps, surgical camps** or any other **healthcare activity**.
  - **Phase Out:** **Chlorinated plastic bags, gloves and blood bags** has been phased out **within two years** starting from **March 2016**.
  - **Pre-treatment:** Pre-treatment of the laboratory waste, microbiological waste, blood samples and blood bags through disinfection or sterilisation on-site in the manner prescribed by the **World Health Organization (WHO)** or by the **National AIDS Control Organisation (NACO)**.
  - **Categorisation:** Bio-medical waste has been classified into **4 categories instead of the earlier 10 categories** to improve the segregation of waste at source.
  - **Stringent Standards for Pollutants:** The rules prescribe more stringent standards for **incinerators to reduce the emission** of pollutants in the environment.
  - **Role of State Government:** The State Government provides the **land for setting up common bio-medical waste treatment and disposal facilities**.
  - **Concerns:**
    - **Pandemic:** The pandemic has presented a challenge in terms of capacity to scientifically dispose of generated waste and a challenge for civic authorities in charge of its collection and disposal.
    - **Poor Compliance:** States are not following the **CPCB guidelines** on Covid-19 related waste.
      - In some states, improper segregation of waste has been reported from **Covid-19 facilities and quarantine homes**.

Note:





- **Non Segregation:** The non-segregation of waste results in the incineration of contaminated plastics producing toxic gases and adding to air pollution.
- **Increase in Waste:** The rise in residential biomedical waste and its collection without adhering to safety protocols could also trigger a surge in caseload.
- **Health of Workers Associated:** Without proper scientific management of such waste, it can potentially affect patients and can affect the **concerned workers and professionals**.
  - Discarded masks and gloves risk the lives of thousands of **sanitation workers** who work often without any protection or training to handle such hazardous material.

#### ➤ **Suggestions:**

- **Proper Segregation:** Left-over food, disposable plates, glasses, used masks, tissues, toiletries, etc used by Covid-19 patients should be put in **yellow-coloured bags**, while used gloves should be put in **red bags** and sent for sterilisation and recycling at the CBWTFs.
  - Where waste is not going to incinerators, **deep burial systems** should be properly maintained as per protocols taking all due precautions to prevent harm to the environment. A deep burial system involves burying biomedical waste in **2-meter-deep ditches and covering them with a layer of lime and soil**.
- **Awareness Campaign:** Initiatives like conducting an appropriate programme on Doordarshan, All India Radio and other media platforms to create mass awareness about the correct disposal of biomedical waste.
- **Creating Infrastructure:** The government should set up recycling plants **across the country** (as envisaged under the **Smart cities project**) under the **Public-Private Partnership** (PPP) Model.
- **Coherency in Rules:** The Centre should form a national protocol combining the Biomedical Waste Management Rules, 2016 with the guidelines on Extended Producer Responsibility (EPR) for producers of plastic.
- **Innovation:** Incentivise **start-ups** and **Small and Medium Enterprises** (SMEs) offering solutions for waste segregation and treatment.
- **Monitoring:** There should be constant and regular monitoring by the central and state PCBs,

Health Departments in the states/UTs and by the high-level task team at Central level with further coordination by CPCB.

## Carbon Sequestration

### *Why in News*

There has been **increasing investments to develop technology** in the field of **Carbon Sequestration** and fight the menace of **climate change**.

### *Key Points*

#### ➤ **Need:**

- As Global Warming accelerates and society continues to emit greenhouse gases, the idea is gaining of investing in **artificial techniques of Carbon Sequestration**.
- According to the **Intergovernmental Panel on Climate Change**, nations may need to remove between **100 billion and 1 trillion tonnes of carbon dioxide** from the atmosphere this century to **avert the worst effects of climate change**, far more than can be absorbed by simply planting more trees.

#### ➤ **About:**

- Carbon sequestration is the **long-term storage of carbon in plants, soils, geologic formations, and the ocean**.
- Carbon sequestration **occurs both naturally and as a result of anthropogenic activities** and typically refers to the storage of carbon.

#### ➤ **Types:**

- **Terrestrial Carbon Sequestration:**
  - Terrestrial carbon sequestration is the process through which  $\text{CO}_2$  from the atmosphere is **absorbed by trees and plants through photosynthesis and stored as carbon** in soils and biomass (tree trunks, branches, foliage, and roots)
- **Geologic Carbon Sequestration:**
  - $\text{CO}_2$  can be stored, including **oil reservoirs, gas reservoirs, unmineable coal seams**, saline formations and shale formations with high organic content.
- **Ocean Carbon Sequestration:**
  - Oceans absorb, release and store large amounts of  $\text{CO}_2$  from the atmosphere. This can be done

Note:



in two ways- **enhancing productivity** of ocean biological systems through **Iron fertilization**, and **injecting CO<sub>2</sub>** into the deep ocean.

- The dumping of iron stimulates phytoplankton production, which in turn leads to enhanced photosynthesis from these microorganisms, helping in CO<sub>2</sub> absorption.

#### ➤ **Methods:**

##### ○ **Natural Carbon Sequestration:**

- It is the process by which nature has achieved a **balance of carbon dioxide in our atmosphere suitable** for sustaining life. Animals expel carbon dioxide, as do plants during the night.
- Nature provided **trees, the oceans, earth and the animals themselves as carbon sinks, or sponges**. All organic life on this planet is carbon based and when plants and animals die, much of the carbon goes back into the ground where it has little impact on contributing to global warming.

##### ○ **Artificial Carbon Sequestration:**

- Artificial carbon sequestration refers to a **number of processes** whereby **carbon emissions are captured at the point of production (e.g. Factory Chimneys) and then buried**.
- One proposed method is ocean sequestration whereby carbon dioxide is **injected deep into the ocean**, forming **lakes of CO<sub>2</sub>**. In theory, the CO<sub>2</sub> will stay down deep due to the pressure and temperature of the surrounding water, gradually dissolving into that water over time.
- Another example is **geological sequestration** where the carbon dioxide is **pumped into underground chambers such as old oil reservoirs, aquifers and coal seams that are unable to be mined**.

##### ○ **Challenges of Artificial Carbon Sequestration:**

- **Lack of technology:**
  - A growing number of corporations are pouring money into so-called engineered carbon removal techniques.
  - However, these technologies are at a **nascent stage** and need an **overhaul to be exploited**.
- **High Cost:**
  - Carbon removal technologies remain **too expensive for widespread use**.

- Artificial carbon sequestration is **costly, energy intensive, relatively untested** and has **no other side benefits**.

##### ● **Environmental Concerns:**

- Carbon dioxide may be stored deep underground. Reservoir design faults, rock fissures, and tectonic processes may act to release the gas stored into the ocean or atmosphere leading to unintended consequences such as **ocean acidification** etc.

##### ○ **Potential of Artificial Carbon Sequestration:**

##### ● **Faster Sequestration:**

- Natural sequestration is a slow process compared to artificial sequestration. Thus it can complement natural sequestering to achieve goals which are necessary to fight climate change.

##### ● **Increase in Productivity:**

- Enhanced agricultural yield and better oil recovery as a result of stored carbon in underground chambers such as old oil reservoirs, aquifers and coal seams.

##### ● **Employment Generation:**

- This new and emerging field is attracting private players and venture capitalists, which in turn can help in employment generation.

## Adaptation Gap Report 2020: UNEP

### *Why in News*

Recently, the **United Nations Environment Programme (UNEP) Adaptation Gap Report 2020** estimated the annual cost of adaptation to the effects of **climate change** for developing countries to at least **quadruple by 2050**.

- The current cost for these countries is in the range of **USD 70 billion (Rs 5.1 lakh crore) and may rise to USD 140-300 billion in 2030 and USD 280-500 billion in 2050**.

### *Key Points*

#### ➤ **Adaptation Cost:**

- It includes costs of **planning, preparing for, facilitating and implementing adaptation measures**.

Note:



- The ever-increasing **adaptation cost has also outpaced the growth in adaptation finance** and that is the reason for a maintained **Adaptation Finance gap**.
  - **Adaptation Finance:** It refers to the flow of funds to developing countries to help them tide over the damages caused by weather events from climate change.
  - **Adaptation Finance gap:** It is the difference between **Adaptation Cost** and **Adaptation Finance**.
- Adaptation costs, in actual terms, is **higher in developed countries** but the **burden of adaptation is greater for developing countries** in relation to their gross domestic product.
- The developing countries, especially in Africa and Asia, which are **least equipped to tackle climate change** will also be the **most impacted by it**.
- **Global Challenges:**
  - **Rising Temperature:** The world is heading for at least a **3°C temperature rise** this century, according to current **Paris Agreement** pledges. Even if we limit global warming to well below 2°C, or even 1.5°C, the **poor countries will suffer**.
  - **The Pandemic:** The **Covid-19 pandemic** has impacted adaptation efforts but its effect is not yet quantified.
  - **Other Challenges:** Last year was not just marked by the pandemic but also by devastating natural calamities like **floods, droughts, storms, forest fires and locust plagues** impacting around 50 million lives globally.
- **Global Adaptation for Climate Change:** Three-quarters of all the countries have adopted at least one climate change adaptation planning instrument and **most developing countries are working on national adaptation plans**.
- **Some of the Indian Initiatives to Fight Climate Change:**
  - India has shifted from **Bharat Stage-IV (BS-IV) to Bharat Stage-VI (BS-VI) emission** norms from 1<sup>st</sup> April 2020 which was earlier to be adopted by 2024.
  - **National Clean Air Programme (NCAP):**
    - It was launched in **January 2019**.
    - It is a five-year action plan with a tentative target of **20-30% reduction in concentrations of PM10 and PM2.5 by 2024**, with 2017 as the base year.
- It has distributed more than **360 million LED bulbs** under the **UJALA scheme**, which has led to energy saving of about 47 billion units of electricity per year and **reduction of 38 million tonnes of CO<sub>2</sub> per year**.
- **The Jawaharlal Nehru National Solar Mission:**
  - It was **launched in 2009** with the primary aim of achieving grid parity by 2022 and with coal-based thermal power by 2030.
  - Aims to **increase the share of solar energy in India's energy mix**.
- **National Action Plan on Climate Change (NAPCC):**
  - It was **launched in 2008**.
  - It aims at **creating awareness** among the representatives of the public, different agencies of the government, scientists, industry and the communities on the **threat posed by climate change and the steps to counter it**.

#### United Nations Environment Programme

- The UNEP is a leading global environmental authority established on 5th June 1972.
- **Functions:** It sets the global environmental agenda, promotes the sustainable development within the **United Nations** system, and serves as an authoritative advocate for global environment protection.
- **Major Reports:** **Emission Gap Report**, Global Environment Outlook, Frontiers, Invest into Healthy Planet.
- **Major Campaigns:** Beat Pollution, UN75, World Environment Day, Wild for Life.
- **Headquarters:** Nairobi, Kenya.

## Nagi-Nakti Bird Sanctuaries

### Why in News

Recently, Bihar's first state-level bird festival 'Kalrav' started at the **Nagi-Nakti bird sanctuaries** in the Jamui district, Bihar.

- It is a 3-day event and is expected to draw experts and bird lovers from all over the country.

### Key Points

- **About:**
  - The **Nagi Dam** and **Nakti Dam** are two sanctuaries so close to each other that they can be taken as one bird area.

Note:



- The Nagi- Nakti Bird Sanctuaries have been the home of a wide variety of indigenous species of birds and of migratory birds that turn up during the winters from places like Eurasia, Central Asia, the Arctic Circle, Russia and Northern China..

➤ **Avian Fauna:**

- Over 136 species of birds have been spotted at these sanctuaries.
  - **Bar-headed geese:** Around 1,600 bar-headed geese, which is about 3% of the global population of this variety, have been seen here, as per a report of the **Wetlands International** and because of this rare phenomenon, **the Birdlife International**, a global body, has held the **Nagi Dam Bird Sanctuary to be globally important for conservation of birds' population** and has declared it as an **important bird area**.
    - **Wetland International** is a global not-for-profit organisation dedicated to the conservation and restoration of wetlands.
    - **BirdLife International** is a global partnership of conservation organisations (NGOs) that strives to conserve birds, their habitats and global biodiversity, working with people towards sustainability in the use of natural resources.
  - **Other major birds:** Indian Courser, Indian Sandgrouse, Yellow-wattled Lapwing and Indian Robin.
- **Major threats to the biodiversity of the sanctuaries:** Agricultural runoff; Land dispute between Irrigation and Forest Departments; Leasing out of the site for fishing.
- **Other Bird Sanctuaries of Bihar:**
- Gautam Budha bird sanctuary, Gaya
  - Kawar Jheel bird sanctuary, Bigusarai
  - Kusheshwar asthan bird sanctuary, Darbhanga

## Indian Star Tortoise

### **Why in News**

Recently, **Indian star tortoises** were seized while being smuggled from Andhra Pradesh to Odisha.

### **Key points**

- **Habitat:**
- **Indian star tortoise** is found across the **Indian sub-continent**, more specifically, in the **Central**

**and Southern parts of India, in West Pakistan and in Sri Lanka.**

➤ **Protection Status:**

- **Wild Life Protection Act 1972: Schedule IV**

- **Schedule IV:** This list is for **species that are not endangered**. It includes **protected species but the penalty for any violation is less** compared to the Schedules I and II.



- **Convention on International Trade in Species (CITES):** Appendix I

- **IUCN Status:** Vulnerable

➤ **Threat:** The species faces two threats- **loss of habitat to agriculture** and illegal harvesting for the **pet trade**.

- According to the **Wildlife Crime Control Bureau**, 90% of the trade of Star Tortoise occurs as part of the International pet market.
- If their exploitation had continued at a similar pace or had expanded, a decline of greater than 30% was predicted by 2025.

➤ **Conservation Efforts:**

- Recently India's **proposal to upgrade the protection status** of Star Tortoise from **Appendix II to Appendix I** was approved by the **Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES)**.

## Green Tax

### **Why in News**

Recently, the Centre announced its plans to impose a **"green tax" on older vehicles** in a move to **disincentive the use of polluting vehicles** and to curb pollution in the country.

### **Key Points**

➤ **About:**

- The **Ministry of Road Transport and Highways** will levy a green tax on transport vehicles **older than eight years** at the time of **renewal of fitness certificate** at the rate of **10% to 25% of road tax**.
- The revenue collected through the green tax **will be kept in a different account and will only be utilised for tackling pollution**.

Note:



### ➤ Exemptions:

- Vehicles like strong hybrids, **electric vehicles** and those running on alternate fuels like CNG, ethanol and LPG and vehicles used in farming, such as tractor, harvesters and tillers will be exempted.

### ➤ Differential Taxation:

- Personal vehicles are proposed to be charged green tax at the **time of renewal of registration certification after 15 years**.
- **Public transport vehicles**, such as city buses, will be charged lower green tax.
- **Higher green tax (50% of road tax)** will be levied on vehicles being registered in **highly polluted cities**.
- Differential tax will also be charged depending on fuel (petrol/ diesel) and the type of vehicle.

### ➤ Justification of the Green Tax:

- **Combat Health Hazards by Vehicular Pollution:** The major pollutants like **carbon monoxide (CO)**, **nitrogen oxides (NOx)**, **photochemical oxidants**, **lead (Pb)**, **particulate matter (PM)**, etc. can have direct as well as in-direct impact, like reduced visibility, cancers, respiratory and cardiovascular ailments, increased mortality, morbidity and impaired pulmonary function.
- **In Accordance with “Polluter Pays Principle”:** It is the commonly accepted practice that those who produce pollution should bear the costs of managing it to prevent damage to human health or the environment.
  - **For example**, a factory that produces a potentially poisonous substance as a byproduct of its activities is usually held responsible for its safe disposal. Similarly Green tax is to be paid by the owners of pollution causing vehicles.
  - **Polluter Pays Principle** is part of the **1992 Rio Declaration** which gives broader principles to guide sustainable development worldwide.
- **Carbon Pricing:** India along with the U.S, China and Japan are some of the countries that are hardest hit by climate impacts. In order to mitigate the condition and reduce the **GHG emissions**, one smart approach is pricing Carbon such as introduction of Green tax.
  - **Carbon Pricing:** It is an instrument that **captures the external costs of greenhouse gas (GHG) emissions**—the costs of emissions that the public pays for such as:
    - damage to crops,
    - health care costs from **heat waves** and droughts and
    - loss of property from flooding and sea level rise.

- Carbon pricing **ties them to their sources through a price**, usually in the form of a price on the carbon dioxide (CO<sub>2</sub>) emitted.

### ➤ Criticism of the Green Tax:

- **Additional Burden:** Imposing additional tax on Public transport such as buses will transfer the burden on the public which is already suffering income losses post pandemic crisis.
  - There are **already high rates of taxation on petrol and diesel**, green tax will **further spike the burden** on vehicle owners.
- **Spike in Inflation:** Green tax will contribute in increasing the overall transportation cost which could surge the overall inflation.

### ➤ Other Initiatives to Curb Air Pollution:

- **Graded Response Action Plan**
- **National Electric Mobility Mission Plan (NEMMP)**
- **Faster Adoption and Manufacturing of (Hybrid &) Electric Vehicles in India (FAME India)**

### Suggestions

- **Price Rationalisation:** Prioritisation of hybrid and electric vehicles over carbon fuel based vehicles could be done by rationalising prices of such low emission vehicles rather than imposing additional taxes.
- **Proactive Measures:** Interventions like pollution-monitoring apps should be promoted.
- **Coordinated Efforts:** Fighting air pollution is a public issue and subsequently everybody’s responsibility. Therefore, along with measures like green tax, the need is for concerted and coordinated efforts with active involvement of all the stakeholders. This should include the Government (national, state and local governments), cities, community at large and individuals.

## Electronic Waste Management

### Why in News

Citing huge gaps in compliance of **electronic waste-management rules**, the **National Green Tribunal (NGT)**

Note:



has recently ordered that scientific disposal of **e-waste** should be ensured as per rules.

- The direction has been issued to **central** and all **state pollution control boards**.

#### E-Waste

- E-Waste is short for Electronic-Waste and the term is used to describe old, end-of-life or **discarded electronic appliances**. It includes their components, consumables, parts and spares.
- It is categorised into 21 types under **two broad categories**:
  - Information technology and communication equipment.
  - Consumer electrical and electronics.
- **Laws to manage e-waste have been in place in India since 2011**, mandating that only authorised dismantlers and recyclers collect e-waste. **E-waste (Management) Rules, 2016** was enacted in 2017.
- **India's first e-waste clinic** for segregating, processing and disposal of waste from household and commercial units has been set-up in **Bhopal, Madhya Pradesh**.

#### Key Points

- **E-waste Generation in India**:
  - According to the **Central Pollution Control Board (CPCB)**, India generated more than **10 lakh tonnes of e-waste in 2019-20**, an increase from **7 lakh tonnes in 2017-18**. Against this, the **e-waste dismantling capacity** has not been increased from **7.82 lakh tonnes** since 2017-18.
  - In 2018, the Ministry of Environment had told the tribunal that **95% of e-waste** in India is **recycled by the informal sector** and **scrap dealers unscientifically dispose of it** by burning or dissolving it in acids.
- **NGT's Directions**:
  - **Further steps should be taken for scientific enforcement of E-Waste Management Rules, 2016 (EWMR)** in the light of the reports of the CPCB.
    - It **noted gaps in collection targets**, as the amount of e-waste collected in 2018-19 was 78,000 tonnes against a target of 1.54 lakh tonnes. There are **clear governance deficits** on the subject.
  - The CPCB **may consider steps for compliance of Rule 16 requiring reduction in the use of Hazardous**

**substances** in the manufacture of electrical and electronic equipment and their components or consumables or parts or spares.

- It took note that **a large number of accidents take place in residential areas on account of unscientific handling of e-waste**. This needs special attention for constant vigilance in such hotspots. This also requires **review and updation of siting norms for e-waste by the CPCB** which may be done within three months.
- All the **state pollution control boards need to identify the hotspots** by constant vigil and to coordinate with the District Administration at local levels to prevent damage to the environment and public health and meaningful enforcement of rule of law.

#### E-Waste Management Rules, 2016

- The Ministry of Environment, Forest and Climate Change notified the **E-Waste Management Rules, 2016** in supersession of the **E-waste (Management & Handling) Rules, 2011**.
- Over 21 products (Schedule-I) were included under the purview of the rule. It included **Compact Fluorescent Lamp (CFL) and other mercury containing lamps**, as well as other such equipment.
- For the first time, the rules brought the **producers under Extended Producer Responsibility (EPR), along with targets**. Producers have been made responsible for the collection of E-waste and for its exchange.
- Various producers can have a separate **Producer Responsibility Organisation (PRO)** and ensure collection of E-waste, as well as its disposal in an environmentally sound manner.
- **Deposit Refund Scheme** has been introduced as an additional economic instrument wherein the producer charges an additional amount as a deposit at the time of sale of the electrical and electronic equipment and returns it to the consumer along with interest when the end-of-life electrical and electronic equipment is returned.
- The role of **State Governments has been also introduced** to ensure safety, health and skill development of the workers involved in dismantling and recycling operations.
- A provision of **penalty for violation of rules** has also been introduced.

Note:



- **Urban Local Bodies** (Municipal Committee/Council/ Corporation) have been assigned the duty to collect and channelize the **orphan products to authorized dismantlers or recyclers**.
- Allocation of **proper space to existing and upcoming industrial units for e-waste dismantling and recycling**.

## Bandipur Tiger Reserve

### Why in News

- A stranded wild elephant was rescued in Nugu reservoir, close to **Bandipur Tiger Reserve** in Karnataka.
- According to the **Tiger census 2018**, Karnataka has the second highest number of tigers in the country after Madhya Pradesh.

### Key Points

- **Establishment:** It was established in 1973 under **Project Tiger**. In 1985, by including adjacent areas from **Venugopala Wildlife Park**, it was enlarged and named as Bandipur National Park.
- **Location:** It is situated in two contiguous districts (Mysore and Chamaraajanagar) of Karnataka and is located at the **tri-junction area of the States Karnataka, Tamil Nadu and Kerala**. It forms a part of **Nilgiri Biosphere Reserve**.
- **Ecological Diversity:** It lies in one of the richest biodiversity areas of the country. It is surrounded by
  - **Mudumalai Tiger Reserve** (Tamil Nadu) in the South,
  - **Wayanad Wildlife Sanctuary** (Kerala) in the South-west &
  - The **Kabini Reservoir** separates the Bandipur and Nagarhole Tiger Reserve on the North-west.
- **Biodiversity:** It is endowed with rich floral and faunal diversity and is recognized as one of the **Mega Biodiversity Areas in the country**.
  - The Bandipur along with Nagarhole, Mudumalai, Sathyamangalam & Wayanad constitutes the single **largest Wild population of Tigers in the world**.
  - This Landscape is also home to the **single largest Asian Elephant population** in the world and is part of the **Mysore Elephant Reserve (MER)**.
- **Rivers and the Highest Point:** The park is located between the **Kabini river** in the north and the **Moyar river** in the south. The **Nugu river** runs through the

park. The highest point in the park is on a hill called **Himavad Gopalswamy Betta**.

- **Other Tiger Reserves in Karnataka:**
  - Bhadra Tiger Reserve
  - **Nagarhole Tiger Reserve**
  - **Dandeli-Anshi Tiger Reserve**
  - Biligiriranganatha Swamy Temple(BRT) Tiger Reserve
  - Besides, **Malai Mahadeshwara Wildlife Sanctuary** has been **proposed** to be made a tiger reserve.

### Asian Elephants

- **Subspecies:** There are **three subspecies** of Asian elephant which are the Indian, Sumatran and Sri Lankan.
- **Protection Status:**
  - **IUCN Red List Status:** Endangered.
  - **Wildlife (Protection) Act, 1972:** Schedule I.
- **Conservation Efforts:**
  - Gaj Yatra.
  - **The Monitoring the Illegal Killing of Elephants (MIKE) programme.**
  - **Project Elephant.**

## Nilgiri Elephant Corridor Case

### Why in News

Recently, the **Supreme Court (SC)** appointed a **conservationist as Member of a Technical Committee** constituted in the **October 2020 case** to hear complaints by landowners against sealing of their buildings infringing the **Nilgiri Elephant Corridor** in Tamil Nadu by the state authorities.

### Key Points

- **About the October 2020 Case:**
  - In October 2020, **SC had upheld the Tamil Nadu government's authority to notify an 'elephant corridor'** and protect the migratory path of the animals through the **Nilgiri biosphere reserve**.
  - The SC had said it was the State's duty to protect a **"keystone species"** such as elephants, immensely important to the environment.
  - The SC also **allowed the formation of a committee** led by a retired HC judge and two other persons

Note:

### Nilgiri Biosphere Reserve

#### ➤ Origin:

- The name 'Nilgiris' with literary meaning 'blue mountains' has originated from the blue flower clad mountains of the Nilgiris plateau within the State of Tamil Nadu.
- It was the **first biosphere reserve in India** established in the year 1986.

#### ➤ Geography:

- The total area of the Nilgiri Biosphere Reserve is 5,520 sq. km.
- It is **located in the Western Ghats** and encompasses parts of **Tamil Nadu, Kerala and Karnataka**.

#### ➤ Ecological Characteristics:

- **Confluence of Biotic zones:** It exemplifies the **tropical forest biome** which portrays the **confluence of Afro-tropical and Indo-Malayan biotic zones** of the world.
- **Biodiversity Hotspot:** Biogeographically, Western Ghats is the most important region and one of the noted **Biodiversity Hotspots** (biogeographic regions having **highest density of endemic species**) for speciation in the tropics.

#### ➤ Vegetation:

- The NBR harbors a wide spectrum of ecosystem types. Major parts of the core areas spread over Kerala and Tamil Nadu States, include **evergreen, semi evergreen, moist deciduous montane sholas and grassland types of vegetation**.
- Whereas the core area spread over the State of Karnataka contains mostly **dry deciduous forests and a few patches of moist deciduous, semi evergreen and scrub jungles**.

#### ➤ Fauna:

- Animals like **Nilgiri tahr, Nilgiri langur, slender loris, blackbuck, tiger, gaur, Indian elephant and marten** are found here.
- Freshwater fishes such as **Nilgiri danio** (*Devario neilgherriensis*), **Nilgiri barb** (*Hypselobarbus dubuis*) and **Bowany barb** (*Puntius bovanicus*) are endemic to this Biosphere Reserve.

#### ➤ Water resources:

- Many of the major tributaries of the river **Cauvery** like the **Bhavani, Moyar, Kabini and other rivers like Chaliyar, Punampuzha**, etc., have their source and catchment areas within the reserve boundary.

#### ➤ Tribal Population:

- Tribal groups like the **Todas, Kotas, Irullas, Kurumbas, Paniyas, Adiyans, Edanadan Chettis, Cholanaickens, Allar, Malayan**, etc., are native to the reserve.

#### ➤ Protected Areas in NBR:

- The **Mudumalai Wildlife Sanctuary, Wayanad Wildlife Sanctuary, Bandipur National Park, Nagarhole National Park, Mukurthi National Park and Silent Valley** are the protected areas present within this reserve.

to hear the individual objections of resort owners and private landowners within the corridor space.

- The SC judgment was based on **appeals filed by resorts/private landowners, against a Madras High Court decision of July 2011**.

#### ➤ Madras HC Judgement:

- In 2011, the Madras HC **upheld the validity of the Tamil Nadu government's notification (of 2010) declaring an 'Elephant Corridor'** in the Sigur Plateau of Nilgiris District.

- It said that the government is fully empowered under the **'Project Elephant'** of the Union government as well as **Article 51 A(g)** of the Constitution to notify the elephant corridor in the state's Nilgiris district.

- **Article 51 A(g):** It shall be the **fundamental duty** of every citizen of India to protect and improve the natural environment including forests, lakes, rivers and wildlife and to have compassion for living creatures.

Note:





- Further, it upheld directions to the resort owners and other private landowners to vacate lands falling within the notified **Nilgiri elephant corridor**.
- **Nilgiris Elephant Corridor:**
  - The corridor is situated in the ecologically fragile **Sigur plateau, which connects the Western and the Eastern Ghats** and sustains elephant populations and their genetic diversity.
    - It is situated near the **Mudumalai National Park** in the Nilgiris district.
  - It has the Nilgiri hills on its southwestern side and the **Moyar river valley** on its northeastern side. The elephants cross the plateau in search of food and water.
  - There are about 100 elephant corridors in India of which almost 70% are used regularly.
    - 75% of the corridors are in the southern, central and north-eastern forests.
    - There are an estimated 6,500 elephants in just the **Brahmagiri-Nilgiris-Eastern Ghats ranges**.
- **Challenges for Elephant Corridors:** 'Right of Passage', an 800-page study released in August 2017, authored by experts and published by the **Wildlife Trust of India (WTI)** identifies and records details pertaining to 101 elephant corridors across India.
  - **Narrowing Passage Width:** Only 22% corridors are of a width of one to three kilometres in 2017, compared with 41% in 2005, pointing to how constricted corridors have become in the past 12 years.
- **Human Encroachment of Corridors:** 21.8% of corridors were free of human settlements in 2017 compared with 22.8% in 2005.
- **Intercepted Corridors:** About 36.4% of the elephant corridors in northwestern India, 32% in central India, 35.7% in northern West Bengal and 13% of the elephant corridors in northeastern India have **a railway line** passing through them.
  - Almost two-thirds of the corridors have a **National or State Highway** passing through them, fragmenting habitats and hindering elephant movement further.
  - 11% of corridors have canals passing through them.
  - 12% are affected by mining and the extraction of boulders.
- **Land-use Along Corridors:** In terms of land use, only 12.9% of the corridors are totally under forest cover in 2017 compared with 24% in 2005.
  - Two in every three elephant corridors in the country are now affected by agricultural activities.
- **Other Initiatives for Conservation of Elephants:**
  - **Gaj Yatra.**
  - **Project Elephant.**
  - **The Monitoring the Illegal Killing of Elephants (MIKE).**



Note:



# History

## Highlights

- Pandit Govind Ballabh Pant
- Lala Lajpat Rai
- Sree Narayana Guru

## Pandit Govind Ballabh Pant

### Why in News

Recently, a statue of **freedom fighter Govind Ballabh Pant** was unveiled at its new location on a roundabout at the Pandit Pant Marg, New Delhi.

- The statue had to be relocated from its earlier location near Raisina Road circle as it 'fell within the new Parliament building layout'

### Key Points

#### ➤ Brief Profile:

- Govind Ballabh Pant is remembered as one of the country's most prominent freedom fighters and an administrator who played a key role in shaping modern India.
- He was the Premier of United Provinces (1937 - 1939), First Chief Minister of Uttar Pradesh (1946 - 1954) and Union Home Minister (1955 - 1961) and was a recipient of the highest civilian award, the **Bharat Ratna** in 1957.



#### ➤ Early Life:

- Pant was born on 10<sup>th</sup> Sept 1887 in Uttarakhand, at Almora.
- When he was 18 years old, he started serving as a volunteer at sessions of the **Indian National Congress**, looking up to **Gopalkrishna Gokhale** and **Madan Mohan Malaviya** as his idols.
- In 1907, he decided to study law, after receiving his degree, he started to practise law in Almora in 1910 and eventually moved to Kashipur.

- In Kashipur, he established an organisation called Prem Sabha, that started working towards several reforms and also saved a school from shutting down due to non-payment of taxes to the British government.

#### ➤ Contribution in National Movement:

- Govind Ballabh Pant joined the Congress in December 1921 and soon joined the **non-cooperation movement**.
- In 1930, he was imprisoned for organizing a **Salt March** inspired by Gandhi's earlier actions.
- He was elected to the Uttar Pradesh (then known as United Provinces) Legislative Assembly as the candidate of the Swarajist Party from Nainital.
  - When in Government, he tried to bring in reforms which would do away with the **Zamindari system**.
  - He also pleaded to the Government for lowering agricultural taxes on farmers.
  - He encouraged many cottage industries in the country and raised his voice against the coolie-beggar law, which forced porters to transport the heavy luggage of British officials without any payment.
  - Pant was always against a separate electorate for minorities, saying the step would further divide communities.
- During the **Second World War**, Pant tried to conciliate between **Gandhi's** faction, which advocated supporting the British Crown in their war effort, and **Subash Chandra Bose's** faction, which advocated taking advantage of the situation to expel the British Raj by any means necessary.
- In 1942 he was arrested again, this time for signing the **Quit India resolution**, and spent three years in Ahmednagar Fort along with other members of the Congress working committee until March 1945.

Note:



drishti

- Pandit Jawaharlal Nehru pleaded successfully for Pant's release, on grounds of failing health.

#### ➤ Post Independence:

- After independence, Govind Ballabh Pant became the Chief Minister of Uttar Pradesh. He worked for the upliftment of the farmers and the eradication of untouchability.
- After the death of **Sardar Patel**, Govind Ballabh Pant was made the Home Minister in the Union Government.
- As a Home Minister, he championed the cause of Hindi as the national language or *rashtrabhasha*.

## Lala Lajpat Rai

### Why in News

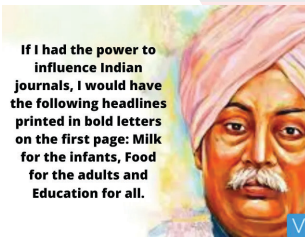
Recently, the Prime Minister paid tribute to **Lala Lajpat Rai** on his Jayanti.

- Lala Lajpat Rai's birth anniversary is **celebrated on 28<sup>th</sup> of January every year.**

### Key Points

#### ➤ About:

- Lala Lajpat Rai was one of the greatest **freedom fighters of India.**
- He was also called **'Punjab Kesari'** and **'Lion of Punjab'**.
- He **studied law** at the Government College, Lahore.
- Was **influenced by Swami Dayananda Saraswati** and joined the Arya Samaj in Lahore.
- He believed that the **ideals in Hinduism combined with nationalism will lead to the establishment of a secular state.**
- Along with Bipin Chandra Pal and Bal Gangadhar Tilak, **he formed the Lal-Bal-Pal trio of extremist leaders.**
- He was also **involved with the Hindu Mahasabha.**
- He **fought against untouchability.**
- **Birth:**
  - He was born on **28<sup>th</sup> January, 1865** in a small village named **Dhudike in Punjab's Ferozepur district.**



#### ➤ Contributions:

##### ○ Political:

- He **joined the Indian National Congress (INC)** and participated in many political agitations in Punjab.
- For his political agitation, **he was deported to Burma without trial in 1907** but returned after a few months because of lack of evidence.
- He was **opposed to the partition of Bengal.**
- He **founded the Home Rule League of America in 1917** in New York. In the USA, he worked to get moral support for the Indian independence movement from the international community.
- He was also elected **President of the All India Trade Union Congress.**
- He **supported the non-cooperation movement** of Gandhi at the Nagpur session of the Congress in 1920.
- He **protested against the Rowlatt Act** and the **Jallianwala Bagh massacre** that followed.
- He was elected **deputy leader of the Central Legislative Assembly in 1926.**
- In 1928, he moved a resolution in the assembly **refusing cooperation with the Simon Commission** since the Commission had no Indian members.

##### ○ Social:

- He founded **Hindu Relief movement in 1897** to provide help to the famine-stricken people and thus preventing them falling into the clutches of the missionaries.
- He founded the **Servants of People Society in 1921.**

##### ○ Literary:

- His important literary works include *Young India*, *England's Debt to India*, *Evolution of Japan*, *India's Will to Freedom*, *Message of the Bhagavad Gita*, *Political Future of India*, *Problem of National Education in India*, *The Depressed Glasses*, and the travelogue '*United States of America*'.

##### ○ Institutional:

- He founded several institutions and organizations such as **Hisar Bar Council**, **Hisar Arya Samaj**, **Hisar Congress**, **National DAV Managing Committee.**
- He was the **editor of the Arya Gazette**, which he had founded.

Note:

- He co-founded the **Punjab National Bank in 1894**.

#### ➤ **Death:**

- In 1928, he was leading a **silent protest against the Simon Commission** in Lahore when he was brutally **lathi-charged by Superintendent of Police, James Scott**. He died of injuries sustained a few weeks later.

## Sree Narayana Guru

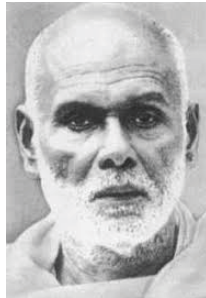
### **Why in News**

The **Vice President of India** has virtually launched **“Not Many, But One”**, an **English translation** of poems of **Sree Narayana Gurudev**.

### **Key Points**

#### ➤ **Birth:**

- Sree Narayana Guru was born on **22<sup>nd</sup> August, 1856** to Madan Asan and his wife Kuttiyamma in Chempazhanthy, a village near Thiruvananthapuram, Kerala.



#### ➤ **Early Days and Education:**

- His family belonged to the **Ezhava caste** and was considered **‘avarna’** according to the social mores of the time..
- Right from his childhood he loved **solitude and always indulged himself in deep contemplation**. He was intensely drawn to worship at the local temples and composed hymns and several devotional songs.
- From an early age, he was **drawn towards asceticism**. He lived as a hermit in a forest **for eight years**.
- He learned Vedas, Upanishads, literature, logical rhetoric of Sanskrit, Hatha **Yoga and other philosophies**.

#### ➤ **Important Works:**

- **Against Caste Injustice:**
  - He gave the famous slogan **“One Caste, One Religion, One God for All”** (Oru Jathi, Oru Matham, Oru Daivam, Manushyanu).
  - In 1888, he built a temple dedicated to **Lord Shiva at Aruvippuram** which was against the **caste-based restrictions** of the time.

- In one temple he consecrated at Kalavancode, **he kept mirrors instead of idols**. This symbolised his message that the divine was within each individual.

#### ○ **Against Conversions:**

- He taught equality but felt the inequalities should not be exploited to carry out conversions and therefore generate strife in society.
- Narayana Guru organized an All-Region Conference in 1923 at Alwaye Advaita Ashram, which was reported to be the first such event in India. This was an effort to counter the religious conversions Ezhava community was susceptible to.

#### ➤ **Philosophy of Sree Narayana Guru:**

- Sree Narayana Guru became one of the greatest proponents and re-evaluators of **Advaita Vedanta**, the principle of non-duality put forward by **Adi Shankara**.

#### ➤ **Literary Works:**

- He wrote various books in different languages. Few of them are: Advaita Deepika, Asrama, Thevarappathinkangal, etc.

#### ➤ **Contribution to National Movement:**

- A remarkable social reformer, he was in the forefront of the movement for **universal temple entry** and against the **societal ills like the social discrimination of untouchables**.
- Narayana Gurudev provided the impetus for **Vaikom agitation** which was aimed at **temple entry in Travancore** for the **lower castes**. It drew nationwide attention and appreciation from **Mahatma Gandhi**.
- He captured the **essence of Indianness** in his poems which highlighted the unity that lies beneath the world’s apparent diversity.

#### ➤ **Contribution to Science:**

- Emphasized the practice of ideals of cleanliness, promotion of education, agriculture, trade, handicrafts and technical training.
- Sree Narayana Gurudev’s **Adyaropa darsanam** (Darsanamala) explains the **creation of the universe**.
- **Daivadasakam** and **Atmopadesa satakam** are a few examples of how the mystic reflections and insights closely resemble **recent advances in physics**.

Note:





➤ **Current Relevance of Philosophy:**

- Gurudev's philosophy of Universal Oneness has special relevance in the contemporary global context where in the social fabric of many countries and communities are being eroded by **hatred,**

**violence, bigotry, sectarianism and other divisive tendencies.**

➤ **Death:**

- 20<sup>th</sup> September, 1928. This day is observed as Sree Narayana Guru Samadhi in Kerala.



Note:

# Art & Culture

## Highlights

- Jallikattu
- Gavi Gangadhareshwara Temple: Karnataka
- Thiruvalluvar Day

## Jallikattu

### Why in News

As the assembly polls are to be held in Tamil Nadu in 2021, the **Pongal festival** and **Jallikattu**, the traditional bull-taming sport, have caught the attention of the Political Parties in the country.

### Key Points

- **About Jallikattu:**
  - **Traditional:**
    - A tradition over 2,000 years old, Jallikattu is a **competitive sport** as well as an event to honour **bull owners** who rear them for mating.
    - It is a violent sport in which contestants try to tame a bull for a prize; if they fail, the bull owner wins the prize.
  - **Areas of Sport:**
    - It is popular in **Madurai, Tiruchirappalli, Theni, Pudukkottai and Dindigul** districts of Tamil Nadu known as the **Jallikattu belt**.
  - **Time of Event:**
    - It is celebrated in the **second week of January, during the Tamil harvest festival, Pongal**.
  - **Importance in Tamil Culture:**
    - Jallikattu is considered a traditional way for the peasant community to preserve their **pure-breed native bulls**.
      - At a time when cattle breeding is often an artificial process, conservationists and peasants argue that Jallikattu is a way to **protect these male animals** which are otherwise used only for meat if not for ploughing.
    - Kangayam, Pulikulam, Umbalachery, Bargur and Malai Maadu are among the **popular native**

**cattle breeds used for Jallikattu.** The owners of these premium breeds **command respect locally**.

### ➤ Legal Interventions on Jallikattu:

- In 2011, the Centre added bulls to the **list of animals whose training and exhibition is prohibited**.
- In 2014, the Supreme Court banned the bull-taming sport, ruling on a petition that cited the **2011 notification**.

### ➤ Current Legal Position on Jallikattu:

- The state government has legalised these events, which has been challenged in the court.
- In 2018, the Supreme Court referred the Jallikattu case to a Constitution Bench, where it is pending now.

### ➤ Conflict to be Resolved:

- Whether the Jallikattu tradition can be protected as a **cultural right of the people of Tamil Nadu which is a fundamental right**.
  - **Article 29 (1) against Rights of animals.**
  - Article 29 (1) mandates that “any section of the citizens residing in the territory of India or any part thereof having a distinct language, script or culture of its own shall have the right to conserve the same”.

### ➤ Position in Other States for Similar Sports:



Note:

- Karnataka too passed a law to save a similar sport, called **Kambala**.
- Except in Tamil Nadu and Karnataka, where bull-taming and racing continue to be organised, these sports remain **banned in all other states** including Andhra Pradesh, Punjab and Maharashtra due to the 2014 **ban order from the Supreme Court**.

## Gavi Gangadhreshwara Temple: Karnataka

### Why in News

The overclouded sky impacted the annual phenomenon called **Surya Majjana** in **Gavi Gangadhreshwara Temple** (Karnataka).

### Key Points

- **Location:** This temple is located in **Bengaluru, Karnataka**.
- **Meaning of the Name:**
  - The temple derives its name from the combination of topographical features and mythology: **gavi (cave)**, and **Gangadhreshwara (shiva)** means the Lord who adorns the **Ganga**.
- **Establishment:**
  - It is believed to have been built by **Kempe Gowda I** in its present form.
- **Architecture Features:**
  - **Celestial Oriented Architecture:** Built in **Vijaynagar style**, it has **unique celestial oriented rock cut architecture** due to which **Surya majjana** occurs on **Sankranti** every year.
    - **Surya Majjana:**
      - Every year on the **Makar Sankranti**, the sun rays fall on the Shiv linga located in the cave (**gavi**) making it shine for ten minutes.
  - **Two Monolithic Structures:**
    - In the forecourt stand two monolithic structures, named **Suryapana and Chandrapana** - each consisting of a **massive disc** atop a supporting pillar.
    - They have engravings of sitting bulls on the discs face each other.
  - **Iconography of Shiva:**

- The compound of the temple is adorned with monolith structures associated with the iconography of Shiva - the **trishula** (trident) and the **damaru** (an hourglass-shaped, two-headed drum).
- In between the two discs there is a brass **dhvajastambha** (flagstaff), and a small cubicle housing a statue of Nandi, Shiva's bull carrier.



### Kempe Gowda I

- Kempe Gowda I was a **feudatory king under Vijayanagar empire**.
- **He founded the city of Bengaluru in 1537** and named it after their family deity's consort, **Kempamma**.
- He is also credited with the construction of several lakes or **keres** for the purposes of drinking water and irrigation eg. the **Dharmambudhi lake**.

### Other Sites in Karnataka

- **Basavakalyan,**
- **Hampi** (World Heritage Site),
- **Badami,**
- **Aihole, etc.**

## Thiruvalluvar Day

### Why in News

The Prime Minister remembered Thiruvalluvar on the occasion of **Thiruvalluvar Day (15<sup>th</sup> January 2021)**, observed to mark the birth anniversary of Tamil poet and philosopher.

### Key Points

- **About the Thiruvalluvar Day:**
  - It was **first celebrated on 17<sup>th</sup>-18<sup>th</sup> May in 1935**.
  - In the **present time**, it is **usually observed either on 15<sup>th</sup> or 16<sup>th</sup> January in Tamil Nadu** and is a **part of Pongal** celebrations.
- **About Thiruvalluvar:**
  - Thiruvalluvar, **also called Valluvar**, was a **Tamil poet-saint**.
    - He is **regarded as a cultural and moral icon for Tamils** across caste and religious lines.

Note:



- The **period when he lived** is debated, as is his religious identity.
  - Some place him in the third or fourth century; others put him in the eighth or ninth.
  - Some call him a Hindu; some trace his past to Jainism; Dravidian groups count him as a saint, as **he dismissed the caste system**.
- His **primary work Thirukkural** (contribution to **Tamil Literature**) contains **1330 couplets (kurals)**.
  - The text is divided into three parts with **teachings on dharma, artha, and kama (virtue, wealth and love)**.
- **Social Significance of Thiruvalluvar:**
  - A **statue** of the legendary Tamil poet was unveiled in **Ulsoor, near Bengaluru, in 2009**. A statue of Valluvar was also erected **outside the School of Oriental and African Studies in Russell Square, London**.
    - A 133-foot tall statue of Thiruvalluvar stands at **Kanyakumari** as well.
  - The **Thiruvalluvar University** was established in Vellore district of Tamilnadu by the Government of Tamilnadu in October 2002.
  - In **1976**, a **temple-memorial called Valluvar Kotam** was built in **Chennai** and houses one of the largest auditoriums in Asia.
  - In the early **16<sup>th</sup> century**, a **temple** dedicated to Thiruvalluvar was built **within the Ekambareswarar temple complex** in Mylapore, Chennai.



Note:



# Geography

## Highlights

- Western Disturbance
- Semeru Volcano of Indonesia
- Ratle Hydro Electric Project

## Western Disturbance

### Why in News

According to the **India Meteorological Department (IMD)**, a **western disturbance** is likely to affect the **Himalayan region** soon.

- The disturbances will result in fairly widespread **light to moderate snowfall and rains** in the **plains of Jammu**.

### Key Points

- Western Disturbance (WD), labelled as an **extra-tropical storm** originating in the **Mediterranean**, is an **area of low pressure** that brings sudden showers, snow and fog in northwest India.
- The **meaning of WD** lies in its name.
  - The **disturbance travels from the “western” to the eastern direction**.
    - These travel eastwards on high-altitude **westerly jet streams** - massive ribbons of fast winds traversing the earth from west to east.
  - **Disturbance** means an **area of “disturbed” or reduced air pressure**.
    - Equilibrium exists in nature due to which the air in a region tries to normalise its pressure.
- In the term **“extra-tropical storm”**, **storm** refers to **low pressure**. **“Extra-tropical”** means **outside the tropics**. As the **WD originates outside the tropical region**, the word **“extra-tropical”** has been associated with them.
- A **WD is associated with rainfall**, snowfall and fog in **northern India**. It arrives with rain and snow in Pakistan and northern India. The **moisture which WDs carry with them comes from the Mediterranean Sea and/or from the Atlantic Ocean**.

- **WD brings winter and pre-monsoon rain** and is important for the development of the **Rabi crop** in the Northern subcontinent.
- The WDs are not always the harbingers of good weather. Sometimes **WDs can cause extreme weather events** like floods, **flash floods, landslides**, dust storms, hail storms and **cold waves** killing people, destroying infrastructure and impacting livelihoods.
  - Expert opinion on western disturbances is divided regarding the **2013 floods in Uttarakhand** in which over 5000 people were killed, after three days of incessant rainfall.

## Semeru Volcano of Indonesia

### Why in News

Recently, **Semeru volcano** erupted in **Indonesia’s East Java province**. Other volcanoes, such as the **Merapi volcano (Java)** and **Sinabung volcano (Sumatra)**, also erupted recently.

### Key Points

- **Semeru Volcano:**
  - Semeru - also known as **“The Great Mountain”** - is the highest volcano in Java and one of the most active.



Note:

- It previously erupted in December, 2019.
- Indonesia, with the maximum number of active volcanoes in the world, is **prone to seismic upheaval** due to its location on the **Pacific's Ring of Fire**.
- Semeru volcano is also the part of the **Island arcs** formed by the subduction of the **Indo-Australian plate** below **Sunda Plate** (part of Eurasian Plate). The trench formed here is called Sunda trench whose major section is the Java Trench.
- **Pacific Ring of Fire:**
  - **The Ring of Fire**, also referred to as the **Circum-Pacific Belt**, is a path along the Pacific Ocean characterized by **active volcanoes and frequent earthquakes**.
  - It traces boundaries between several tectonic plates—including the Pacific, Cocos, Indian-Australian, Nazca, North American, and Philippine Plates.
- **Island Arcs:**
  - They are long, curved chains of **oceanic islands** associated with **intense volcanic and seismic activity and orogenic** (mountain-building) processes.
    - An island arc typically has a **land mass or a partially enclosed, unusually shallow sea** on its concave side.
    - Along the convex side there almost invariably exists a long, **narrow deep-sea trench**.
    - The greatest ocean depths are found in these depressions of the seafloor, as in the case of the **Mariana (deepest trench in the world) and Tonga trenches**.
  - Prime examples of this form of geologic feature include the **Aleutian-Alaska Arc** and the **Kuril-Kamchatka Arc**.

## Ratle Hydro Electric Project

### **Why in News**

The Union Cabinet has given its approval for **850 MegaWatt (MW) Ratle hydropower project** on **Chenab river** in Jammu and Kashmir.

### **Key Points**

- **About the Ratle Hydroelectric Project:**
  - **Location:** It is a **run-of-the-river hydroelectric power station on the Chenab River, Kishtwar**

**district** of the Indian Union Territory of **Jammu and Kashmir**.

- **Features:** It includes a **133 m tall gravity dam** and **two power stations** adjacent to one another.
  - The installed capacity of both power stations will be **850 MW**.
- **Background:** In June 2013, the then Indian Prime Minister laid the foundation stone for the dam.
  - **Pakistan has frequently alleged** that it violates the **Indus Water Treaty, 1960**.
- **The Latest Approval:** It envisages an investment of about **Rs. 5282 crore** and the project shall be **commissioned within a span of 60 months**.
- **Pakistan's Objections and Indus Water Treaty:**
  - The Pakistan government in 2013 had objected to the construction of the dam, claiming that it was not in conformity with the **Indus Water Treaty**.
  - In **August 2017**, the **World Bank** allowed India to **construct the dam**.
  - Pakistan has approached the World Bank **with fresh protests**, but the Centre has now **decided to go ahead with the construction**.
    - The **Indus Waters Treaty** was signed in 1960 after **nine years of negotiations** between India and Pakistan **with the help of the World Bank, which is also a signatory**.
    - The Treaty **provides India an absolute control of all the waters of Eastern Rivers** while **Pakistan shall receive for unrestricted use all those waters of the Western Rivers** which **India** is under obligation to let flow beyond the **permitted uses**.
    - The **Ravi, the Beas and the Sutlej** are together called as **Eastern Rivers** while the **Chenab, the Jhelum and the Indus main** are called as **Western Rivers**.
- **Benefits:**
  - **Strategic:**
    - This comes in the backdrop of India's **plan to expedite strategically important hydropower projects** in the union territory post its reorganization, as the government **plans to fully utilize its share of water under the Indus Waters Treaty of 1960**.
    - The task is seen as strategically vital in the context of China developing the controversial

Note:



**China-Pakistan Economic Corridor (CPEC)**, part of its **One Belt One Road (OBOR)** infrastructure initiative.

- **Socio-Economic Development:** The construction activities of the Project will result in **direct and indirect employment** to around 4000 persons. Increase in **disposable income** will in turn lead to **socio-economic development** of the region.
- **Power at Cheaper Rates:** Union Territory of Jammu and Kashmir will be benefitted by getting **free power** worth Rs. 5289 crore.
- **Surplus Power:** The Power generated from the Project will help in providing **balancing of Grid** and will improve the **power supply position**.
  - Grid balancing involves increasing existing power generating infrastructure to smooth out the supply of power.
- **Government Revenue:** Through levy of **Water Usage Charges** from Ratle Hydro Electric Project, during project life cycle of **40 years**.
- **Other Projects on Chenab Basin:**
  - **Kiru Hydro Electric (HE) Project:**
    - The Kiru HE Project of 624 MW installed capacity is proposed on river Chenab (Kishtwar district).
  - **Pakal Dul (Drangdhuran) Hydroelectric Project:**
    - It is a reservoir based scheme proposed on river **Marusudar**, the main **right bank tributary of river Chenab** in Kishtwar Tehsil of Doda District in Jammu & Kashmir.
  - **Dulhasti Power Station:**

- It is run-of-the-river with an installed capacity of 390 MW to harness the hydropower potential of **river Chenab** (Kishtwar district).
- **Salal Power Station:**
  - It is a run-of-the-river scheme with an installed capacity of 690 MW to harness the Hydropower potential of **river Chenab**. It is located in **Reasi district of Jammu & Kashmir**.

#### Chenab River

➤ **Source:** It rises in the upper Himalayas in the **Lahaul and Spiti district of Himachal Pradesh state**.

- The river is formed by the confluence of two rivers, **Chandra and Bhaga**, at **Tandi, 8 km southwest of Keylong**, in the **Lahaul and Spiti district**.
  - The **Bhaga river** originates from **Surya taal lake**, which is situated a few kilometers west of the **Bara-lacha la pass** in Himachal Pradesh.
  - The **Chandra river** originates from **glaciers east of the same pass** (near Chandra Taal).
- **Flows Through:** It flows through the **Jammu region of Jammu and Kashmir into the plains of Punjab, Pakistan, before flowing into the Indus River**.



Note:

# Social Issues

## Highlights

- India Justice Report 2020
- The Inequality Virus Report: Oxfam International
- Crowdfunding for Rare Diseases
- Performance of Beti Bachao Beti Padhao Scheme

## India Justice Report 2020

### Why in News

The **India Justice Report** (2020) prepared by the **Tata Trusts** in collaboration with the **Centre for Social Justice, Common Cause, DAKSH, Vidhi Centre for Legal Policy** and the **Commonwealth Human Rights Initiative** has been released recently.

- The Report **assesses the capacity of various states to deliver justice.**

### Key Points

- **About the Report:**
  - The report **analysed expenditure, vacancies, representation of women, human resources, infrastructure, workload, diversity across 18 large and medium-sized states** with a population of over 1 crore and **7 small states.**
- **Findings:**
  - **Overall Ranking:**
    - The overall ranking is a result of a state's ranking across the **four pillars of justice delivery system - Judiciary, Police, Prisons and Legal aid.**
    - **Maharashtra** was ranked **topmost** among 18 states for the second time in a row, followed by Tamil Nadu and Telangana. **Uttar Pradesh** remains **last.**
    - Amongst the **smaller states, Goa** remained at the **top** and **Arunachal Pradesh** at the **bottom.**
  - **Women Ratio in Police Force:**
    - **Bihar** leads the list of 25 states for employing most women in its **police force** which is 25.3%.
    - It is the only state to have more than **20% women in the police force.** However, women account for only **6.1% in the officer category.**

- **Tamil Nadu** has the **highest percentage of women police officers** (24.8%), followed by Mizoram (20.1%).

### ○ Women Ratio in Judiciary:

- Overall, **only 29% judges in High Courts** across the country are women, but no state **except Sikkim** has over 20% women judges.

- Four states - Bihar, Uttarakhand, Tripura and Meghalaya **have no woman judges in high courts.**

### ○ Social Justice:

- **Karnataka** is the only state to meet its quotas for SC, ST and OBC in both officer cadre and constabulary.

- **Chhattisgarh** being the only other state that meets the diversity requirements for constabulary.

### ○ Lack of Finances:

- In the last 25 years, only **1.5 crore** people have received legal aid with the Centre spending **Rs. 1.05 per capita in 2019-20.**

### ○ High Proportion of Undertrials:

- **Two-thirds** of all prisoners are **undertrials** awaiting a conviction.
  - A person who is being held in custody awaiting trial for a crime.

### ○ Causes of Poor Justice Delivery:

- Legal services institutions remain affected by a **lack of infrastructure, uneven human resource distribution, poor utilization of central funds and an inability to effectively harness Lok Adalats** to ease the burden on the judiciary.

## The Inequality Virus Report: Oxfam International

### Why in News

Recently, the **Inequality Virus Report**, released by

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**Oxfam International**, has found that the **Covid pandemic** deeply **increased the existing inequalities** in India and around the world.

- The report states that **Covid has the potential to increase economic inequality** in almost every country at once - the first time this has happened since records began over a century ago.

### Key Points

#### ➤ Impact of the Pandemic on Rich vis-a-vis Poor:

- **India introduced one of the earliest and most stringent lockdowns** in the face of the pandemic and its enforcement **brought the economy to a standstill, triggering unemployment, hunger, distress migration and untold hardship** in its wake.
- The **rich were able to escape** the pandemic's worst impact; and while the **white-collar workers isolated themselves and worked from home**, a majority of the **not-so-fortunate Indians lost their livelihood**.
- The **wealth of Indian billionaires increased by 35%** during the lockdown and by 90% since 2009 to USD 422.9 billion, **ranking India sixth in the world after the USA, China, Germany, Russia and France**.

#### ➤ Impact on Informal Sector:

- India's large informal workforce **was the worst hit** as it made up 75% of the **122 million jobs lost**.
- Informal workers had relatively **fewer opportunities to work from home and suffered more job loss** compared to the formal sector.
- The 40-50 million **seasonal migrant workers**, typically engaged working in construction sites, factories etc. were **particularly distressed**.

#### ➤ Impact on Education:

- Over the past year as **education shifted online**, India saw the **digital divide** worsening inequalities.
- On the one hand, **private providers experienced exponential growth** yet, on the other, just **3% of the poorest 20% of Indian households had access to a computer and just 9% had access to the internet**.
- It noted that **the long disruption of schooling risked doubling the rate of out of school**, especially among the poor.

#### ➤ Health Inequalities:

- Oxfam found that since India does not report case data desegregated by socio-economic or social

categories, it is **difficult to gauge the distribution of the disease amongst various communities**.

- India currently has the **world's second-largest cumulative number of Covid-19 positive cases** and globally, the poor, marginalised and vulnerable communities have higher rates of Covid-19 prevalence.
- The **spread of disease was swift among poor communities**, often living in cramped areas with poor sanitation and using shared common facilities such as toilets and water points.
- **Sanitation Facility:**
  - **Only 6% of the poorest 20% households had access to non-shared sources of improved sanitation**, compared to 93% of the top 20% households in India.
  - In terms of caste, **just 37.2% of Scheduled Castes (SCs) households and 25.9% of Scheduled Tribes (STs) households had access to non-shared sanitation facilities**, compared to 65.7% for the general population.
- **Gender Disparities:**
  - **Employment:**
    - The **unemployment rate among women** rose from already high **15% before Covid to 18%**.
    - This increase in unemployment of women **can result in a loss to India's Gross Domestic Product (GDP)** of about 8% or USD 218 billion.
    - Of the women who retained their jobs, as many **83% were subjected to a cut in income according to a survey by the Institute of Social Studies Trust**.
  - **Health:**
    - Beyond income and job losses, **poorer women also suffered healthwise because of the disruption in regular health services and Anganwadi centres**.
    - It is predicted that the **closure of family planning services** will result in 2.95 million unintended pregnancies, 1.80 million abortions (including 1.04 million unsafe abortions) and 2,165 maternal deaths.
  - **Domestic Violence:**
    - The **pandemic also fueled domestic violence against women**. As of November 2020, cases of domestic violence rose by almost 60% over the past 12 months.

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### ➤ Suggestions:

- There is an urgent need for policymakers to **tax the wealthy individuals and rich corporates and use that money to invest in free quality public services and social protection** to support everyone, from cradle to grave.
- Reducing inequalities is very important but it should be a medium-term target. Between growth and distribution, India must get the sequencing right.
- India **needs to grow first before it can distribute**. Otherwise, it can get stuck in a low-income equilibrium.

### Oxfam International

- Oxfam International is a **group of independent non-governmental organisations** formed in **1995**.
- The name "Oxfam" comes from the Oxford Committee for Famine Relief, founded in Britain in 1942.
  - The group campaigned for food supplies to starving women and children in enemy-occupied Greece during the Second World War.
- It **aims to maximize efficiency and achieve greater impact to reduce global poverty and injustice**.
- The Oxfam International Secretariat is based in **Nairobi, Kenya**.

## Crowdfunding for Rare Diseases

### Why in News

Recently, the Delhi **High Court** has ordered the **Ministry of Health and Family Welfare** to explore **Crowdfunding** to help two children, who are suffering from a **Rare Disease** known as **Duchenne Muscular Dystrophy**.

### Key Points

- **Constitutional Provision Involved:**
  - The HC held that '**Right to Health and Healthcare**' is a **fundamental right** which has been recognised by the Supreme Court to be a part of the '**Right to life**' under **Article 21** of the Constitution.
- **Direction to the Society and Authorities:**
  - The **High Court** directed the **society in general and authorities in particular** to ensure that the **life of such children is not compromised**, even if there is a small window of improving their chances of survival or even providing a **better quality of life**.

- Directed the **Ministry of Health and Family Welfare** to give a specific timeline in respect of the finalisation and notification of the **Draft Health Policy for Rare Diseases, 2020**. The draft policy has a section where the **government proposed crowdfunding for treatment of high-cost Rare Diseases**.

### Crowdfunding

#### ➤ About:

- Crowdfunding is a **method of raising capital through the collective effort of a large number of individual investors**.
- This approach taps into the collective efforts of a large pool of individuals, primarily online via social media and crowdfunding platforms and leverages their networks for greater reach and exposure.

#### ➤ Types:

- **Donation-Based Crowdfunding:** Donation-based crowdfunding is a way to source money for a project by asking a **large number of contributors to individually donate a small amount to it**. In return, the backers may receive token rewards that increase in prestige as the size of the donation increases. For the smallest sums, however, the funder may receive nothing at all.
- **Rewards-Based Crowdfunding:** Rewards-based crowdfunding involves **individuals contributing to a business in exchange for a "reward,"** typically a form of the product or service which company offers. Even though this method offers backers a reward, it's still generally considered a subset of donation-based crowdfunding since there is no financial or equity return.
- **Equity-Based Crowdfunding:** Unlike the donation-based and rewards-based methods, **equity-based crowdfunding allows contributors to become part-owners of the company by trading capital for equity shares**. As equity owners, the contributors receive a financial return on their investment and ultimately receive a share of the profits in the form of a dividend or distribution.

#### ➤ Benefits:

- **Reach** – By using a crowdfunding platform, one has **access to thousands of accredited investors** who can see, interact with, and share the fundraising campaign.
- **Presentation** – By creating a crowdfunding campaign, **one goes through the invaluable process**

Note:

of looking at the business from the top level—its history, traction, offerings, addressable market, value proposition, with digestible packages.

- **PR & Marketing** – From launch to close, one can share and **promote the campaign** through social media, email newsletters, and other online marketing tactics.
- **Validation of Concept** – Presenting the concept or business to the masses affords an excellent opportunity to **validate and refine offering**.
- **Efficiency** – One of the best things about online crowdfunding is its **ability to centralize and streamline fundraising efforts**.

### Rare Diseases

- A rare disease is a **health condition of low prevalence** that **affects a small number of people** compared with other prevalent diseases in the general population.
  - There is **no universally accepted definition of rare diseases** and the definitions usually vary across different countries.
- Though rare diseases are of low prevalence and individually rare, collectively they affect a considerable proportion of the population.
- **80% of rare diseases are genetic** in origin and hence disproportionately impact children.
- In India there are **56-72 million people affected by rare diseases**.

#### Duchenne Muscular Dystrophy (DMD)

- **About:**
  - It is a **genetic disorder** characterized by **progressive muscle degeneration and weakness** due to the alterations of a protein called dystrophin that helps keep muscle cells intact.
- **Symptoms:**
  - Muscle weakness
  - Enlargement of the calves
  - A waddling gait
  - Lumbar lordosis (an inward curve of the spine)

## Performance of Beti Bachao Beti Padhao Scheme

### Why in News

The **Beti Bachao Beti Padhao (BBBP)** Scheme has

recently completed 6 years of its launch in **2015**. On the occasion of **National Girl Child Day (24<sup>th</sup> January)**, the performance of BBBP scheme was discussed.

- The **National Girl Child Day** was started by the **Ministry of Women and Child Development in 2008**.

### Key Points

- **About the Beti Bachao Beti Padhao (BBBP) Scheme:**
  - **Main Objectives:**
    - Prevention of gender-biased sex-selective elimination.
    - Ensuring survival & protection of the girl child.
    - Ensuring education and participation of the girl child.
    - Protecting rights of Girl child.
  - **Multisectoral Nationwide Campaign:**
    - BBBP is a **national campaign** and focussed **multisectoral action** in 100 selected districts low in **Child Sex Ratio (CSR)**, covering all States and UTs.
    - This is a **joint initiative** of the Ministry of Women and Child Development, Ministry of Health and Family Welfare and Ministry of Human Resource Development.
- **Performance of BBBP Scheme:**
  - **Sex Ratio at Birth:**
    - **Sex Ratio at Birth (SRB)** has improved by **16 points** from 918 (2014-15) to 934 (2019-20), as per the **Health Management Information System (HMIS)** data.
    - Out of 640 districts covered under BBBP, **422 districts have shown improvement** in SRB from 2014-15 to 2018-2019.
    - **Notable Examples:**
      - **Mau** (Uttar Pradesh) from 694 (2014-15) to 951 (2019-20),
      - **Karnal** (Haryana) from 758 (2014-15) to 898 (2019-20),
      - **Mahendergarh** (Haryana) from 791 (2014-15) to 919 (2019-20), etc.
  - **Health:**
    - **ANC Registration:** Percentage of 1<sup>st</sup> Trimester **ANC (AnteNatal Care) Registration** has shown an improving trend from **61% in 2014-15 to 71% in 2019-20**.

Note:



- **Institutional Deliveries:** Percentage of Institutional Deliveries has shown an improving trend from **87% in 2014-15 to 94% in 2019-20**.
- **Education:**
  - **Gross Enrolment Ratio (GER):** GER of girls in the schools at secondary level has improved from **77.45 (2014-15) to 81.32 (2018-19)** as per **Unified District Information System for Education (UDISE)** provisional data.
  - **Toilet for girls:** Percentage of schools with functional separate toilets for girls has shown improvement from **92.1% in 2014-15 to 95.1% in 2018-19**.
- **Attitudinal Change:**
  - The BBBP scheme has been able to bring the focus on important **issue of female infanticide**, lack of education amongst girls and deprivation of their rights on a life cycle continuum.
- **BetiJanmotsav** is one of the key programmes celebrated in each district.
- **Other Initiatives for Girl Children:**
  - **UJJAWALA:** To tackle the problem of trafficking, it is a Comprehensive Scheme for Prevention of Trafficking and Rescue, Rehabilitation and Re-Integration of Victims of Trafficking for Commercial Sexual Exploitation.
  - **Kishore Health Card:** To record the information about the weight, height, Body Mass Index (BMI) of Adolescent Girls (AGs). These health cards for AGs are maintained at the AnganWadi centres (AWCs).
  - **Scheme for Adolescent Girls (SAG).**
  - **Sukanya Samridhi Yojana, etc.**



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# Security

## Highlights

- UAV Procurement by Indian Army
- Exercise Kavach
- Shaheen-III Missile
- Indo-French Joint Exercise Desert Knight-21
- S-400 Triumph Missile System
- Smart Anti Airfield Weapon

## UAV Procurement by Indian Army

### Why in News

The **Indian Army** has signed a contract to buy **high-altitude drones** from **ideaForge** for **USD 20 million**.

- ideaForge is a start-up founded and incubated by the alumni of **Indian Institute of Technology-Bombay (IIT-B)**.
- The contract is for a **high-altitude variant of SWITCH UAV**, an indigenous system used in surveillance operations.

### Key Points

- **Significance of the Contract:**
  - It marks a **strategic shift of focusing on indigenous technologies** in the Indian defence procurement process.
  - This is an example of **how government-funded start-ups** can help the country grow.
  - This is the **biggest such order** in terms of the contract value, **for any Indian equipment manufacturer for drones**.
- **Importance of UAV for the Army:**
  - The Army has placed an order for the **advanced high-altitude version of SWITCH UAV**, a vertical take-off and landing drone. It is a fixed-wing hybrid Unmanned Aerial Vehicle (UAV). Its features include:
    - **Advanced flight time** with a range of 15 km.
    - Around 2.6m long and 1.8m wide and **weighs less than 6.5 kg**.



- **Higher safety and simple operation** with additional fail-safe redundancies.
- Used for long-duration operations in harsh environments for day and night surveillance in **Intelligence, Surveillance and Reconnaissance (ISR) missions**.
- **Used in Photogrammetry** - the technology of **obtaining reliable information** about physical objects and the environment **through the process of recording, measuring and interpreting photographic images** and patterns of electromagnetic radiant imagery.
- **Other Uses:** Crowd Monitoring, Disaster Management, **Precision Agriculture**, Mining, etc.

## Exercise Kavach

### Why in News

A large-scale **Tri service Military 'Exercise Kavach'** will be conducted in January 2021 under the aegis of the **Andaman and Nicobar Command (ANC)**, the only Joint Forces Command of the country.

- The Andaman and Nicobar Command (ANC) is the **first integrated theatre command** in India with **headquarters at Port Blair**.

### Key Point

- **Participation:** Indian Army, Indian Navy, Indian Air Force and Indian Coast Guard.
- **Features:** The exercise involves synergised application of **maritime surveillance assets, coordinated air and maritime strikes, air defence, submarine and landing operations**.

Note:



- The joint force would execute multi domain, high intensity offensive and defensive manoeuvres in the **Andaman Sea and Bay of Bengal**.
- The tri-services exercise aims to fine tune **joint war-fighting capabilities** and Standard Operating Procedures (SOPs) towards enhancing operational synergy.
- **Significance:** The exercise will check the **preparedness of all the agencies in dealing with an asymmetric threat**.
  - Asymmetrical threats are unconventional strategies and tactics adopted by a force.
- **Need of Such Exercise:** The **1993 Bombay Bombings** and the **2008 Mumbai Attacks** happened due to the **poorly guarded maritime border**.
- **Other Exercises for Coastal Security:**
  - **Exercise 'Sea Vigil'**.
  - **Tropex (Theatre-level Readiness Operational Exercise)** which Indian Navy conducts every **two years**.

## Shaheen-III Missile

### Why in News

Recently, Pakistan has successfully test-fired the Shaheen-III missile.

### Key Points

- **Shaheen-III Missile of Pakistan:**
  - It is a **nuclear-capable surface-to-surface ballistic missile** which can strike targets up to **2,750 km**.
  - The launch of the missile was **aimed at revalidating various design and technical parameters** of the weapon system.
- **Other Recent Developments:**
  - China had recently asked India to “objectively” view the **Eagle-IX (or Shaheen-IX) military exercise** taking place **between the Chinese and Pakistani air forces**, amid **increasing tensions** with India.
- **Some of India's Ballistic Missiles:**
  - **Shaurya missile**,
  - **Prithvi missile**,
  - **Agni missile**, etc.

## Indo-French Joint Exercise Desert Knight-21

### Why in News

Recently, **Indian Air Force (IAF)** and **French Air and Space Force** have conducted a **bilateral Air exercise, Ex Desert Knight-21** at Air Force Station Jodhpur.

### Key Points

- The exercise is unique as it includes fielding of **Rafale aircraft by both sides** and is indicative of the **growing interaction between the two premier Air Forces**.
- Presently, the French detachment for Ex Desert Knight-21 is deployed in Asia as part of their '**SKYROS Deployment**'.
  - Rafale fighter jets of India and France are carrying out **wargames codenamed Exercise SKYROS**.
  - Beginning September 2020, the IAF has inducted and operationalised eight Rafale fighter jets of the 36 jets contracted from France in a 7.87-billion euro deal in 2016.
- **Defence Exercises between India and France:**
  - Varuna – Naval exercise
  - Garuda – Air exercise
  - Shakti – Army exercise



### Note:

- **Gagan Shakti** is conducted by the **Indian Air Force** to showcase its air dominance over the **entire extended area of the Indian Ocean Region**.
  - It includes all terrain operations – **desert, high altitude, maritime scenarios and special operations** – in real time with specific focus on key areas like aerial combat, air to surface combat, paratrooper assault and medical evacuation.
- **Garuda Shakti** is the **joint military exercise** between **India and Indonesia**.
- **Mitra Shakti** is the joint military exercise between **India and Sri Lanka**.

Note:

## S-400 Triumf Missile System

### Why in News

The first group of Indian military specialists are scheduled to depart for Moscow (Russia) soon to undergo training courses on the **S-400 Triumf missile defence system**.

### Key Points

#### ➤ Background:

- In October 2018, **India signed a 5.43 billion USD deal with Russia** for the **S-400 Triumf missile system** despite objections from the US and the threat of sanctions under **Countering America's Adversaries Through Sanctions Act (CAATSA)**.



#### ➤ About the S-400 Triumf Missile System:

- The S-400 Triumf is a mobile, surface-to-air missile system (SAM) designed by Russia. It is the most dangerous operationally deployed modern long-range SAM (MLR SAM) in the world, considered much ahead of the **US-developed Terminal High Altitude Area Defense system (THAAD)**.
- The system **can engage all types of aerial targets** including aircraft, unmanned aerial vehicles (UAV) and ballistic and cruise missiles within the range of 400km, at an altitude of up to 30km.
- The system **can track 100 airborne targets and engage six of them simultaneously**.

#### ➤ Significance for India:

- From India's point of view, **China is also buying the system**. In 2015, China signed an agreement with Russia to purchase six battalions of the system. Its delivery began in January 2018.
  - China's acquisition of the S-400 system has been viewed as a "game changer" in the region. However, its effectiveness against India is limited.
- India's acquisition is **crucial to counter attacks in a two-front war**, including even high-end F-35 US fighter aircraft.

### India Russia Defence Cooperation

#### ➤ Important Pillar:

- Defence cooperation is an important pillar of the **India-Russia strategic partnership**.

#### ➤ Regular Meetings:

- The **two Defence Ministers meet annually**, alternately in Russia and India, to discuss and review the status of ongoing projects and other issues of military technical cooperation.
- In 2008, the **High Level Monitoring Committee (HLMC)** was set up with **Defence Secretary** from the Ministry of Defence (India) and **Director of Federal Service** for Military Technical Cooperation (FSMTC - Russia) as its co-chairs.

#### ➤ Downturn:

- While India and Russia's economic relationship has been a weak point in the **post-Cold War period**, the US emerged as the top arms supplier to India, pushing Russia to the second position based on data for the years 2011-13.

#### ➤ Current Scenario:

- The low of 2013-14 has since been corrected and the crucial deal of S-400 Triumf Air Defence Missile System was initiated despite fears of sanctions under CAATSA.
- As India has been spreading its supplier base with Israel, US and France, Russia still remains a major supplier. This is indicated by following latest developments:
  - India has approved proposals to acquire **Mig29** and **Su30 MKI** fighter aircraft from Russia for 2.4 billion USD.
  - The two sides are successfully moving towards the implementation of a **AK-203 rifle contract** and **200 Ka-226T utility helicopters** supplies.
- **According to a paper published** by Stimson Center, 86% of the equipment, weapons and platforms currently in military service in India are of **Russian** origin.

#### ➤ From Imports to Joint Production:

- Over the years, cooperation in the military technical sphere has evolved from a **purely buyer-seller relationship to joint research, design development and production** of state of the art military platforms.
  - Production of the **Brahmos cruise missile** is an example of this trend.

#### ➤ Joint Exercises:

Note:

- **Exercise INDRA** , is a joint, tri services exercise between India and Russia.
- **Russia's Military Equipment Deployed by India:**
  - **Navy:**
    - The Navy's only active aircraft carrier **INS Vikramaditya** is from Russia. A **nuclear attack submarine Chakra II** is also in service.
  - **Army:**
    - Army's **T-90** and **T-72** main battle tanks.
  - **Air Force:**
    - IAF's **Su30** MKI fighter.

## Smart Anti Airfield Weapon

### Why in News

The **Defence Research and Development Organisation (DRDO)** has conducted a successful trial of the **indigenously developed Smart Anti-Airfield Weapon (SAAW)** off the Odisha coast from the Hawk-I jet of **Hindustan Aeronautics Limited (HAL)**.

- This was the **ninth successful test** of the system **conducted over the last five years**.

### Key Points

- **Background:** The system **belongs to the glide bomb**

**category** and its **development began around 2012-13**, with crucial inputs from the **Indian Air Force (IAF)** and the **first test** was carried out in **2016**.

- **Manufactured by:** DRDO's Research Centre Imarat (RCI) Hyderabad.
- **Features:**
  - The weapon is designed to strike ground targets, especially adversary airfield infrastructure or similar strategically important installations.
  - This is a **125-kilogram** class smart weapon, capable of engaging ground enemy airfield assets such as radars, bunkers, taxi tracks, and runways, up to a **range of 100 kilometres**.
  - The **high precision guided bomb is lightweight** compared to weapon systems of the same class.
- **Other Related Development:** The test of SAAW comes months after **another weapon system designed to target enemy radar and communication assets, Rudram**, was tested in October 2020.
  - **Rudram**, an air-to-surface missile, has been developed to primarily **to enhance the Suppression of Enemy Air Defence (SEAD) capability of the IAF** and can detect, track and neutralise the radar, communication assets and other radio frequency sources belonging to the adversary, which are generally their air defence systems.

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# Miscellaneous

## Highlights

- Parakram Diwas: Netaji Subhash Chandra Bose Jayanti
- India Innovation Index 2020: NITI Aayog
- Guru Gobind Singh
- Risa: Tripura's Signature Garment
- Pradhan Mantri Rashtriya Bal Puraskar
- Padma Awards 2021

## Parakram Diwas: Netaji Subhash Chandra Bose Jayanti

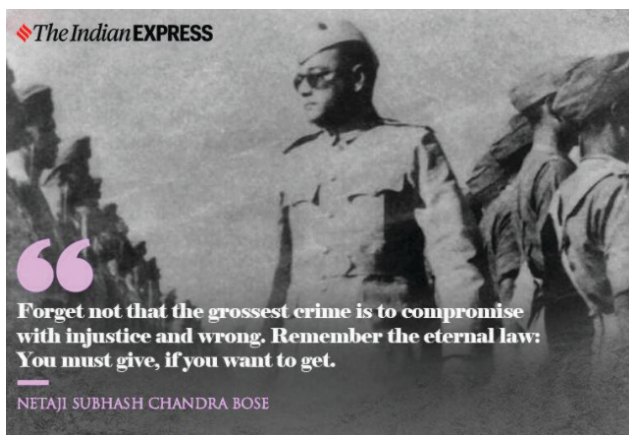
### Why in News

The central government has decided to observe **Subhas Chandra Bose Jayanti** as '**Parakram Diwas**' to be celebrated on 23<sup>rd</sup> January.

- A high-level committee headed by the Prime Minister has also been formed to plan year-round programmes to mark the anniversary of Bose.
- Recently the Government of India has also instituted **Subhash Chandra Bose Aapda Prabandhan Puraskaar** to recognise the excellent work done by the individuals and institutions in the field of disaster management.

### Key Points

- **Birth:**
  - Subhas Chandra Bose was born on **23<sup>rd</sup> January 1897, in Cuttack, Orissa Division, Bengal Province**, to Prabhavati Dutt Bose and Janakinath Bose.
- **About:**



- In 1919, he had cleared Indian Civil Services (ICS) examination. Bose, however, resigned later.
- He was highly **influenced by Vivekananda's teachings** and considered him as his spiritual Guru.
- His **political mentor** was **Chittaranjan Das**.
- **Association with Congress:**
  - He stood for **unqualified swaraj (independence)**, and opposed Motilal Nehru Report which spoke for dominion status for India.
  - He actively participated in the **Salt Satyagraha of 1930** and vehemently opposed the suspension of Civil Disobedience Movement and signing of the **Gandhi-Irwin Pact in 1931**.
  - In the 1930s, he was closely associated with left politics in Congress along with **Jawaharlal Nehru and M.N. Roy**.
  - Bose won the **congress presidential** elections at Haripura in **1938**.
  - Again in **1939 at Tripuri**, he won the presidential elections against Gandhi's candidate Pattabhi Sitarammaya. Due to ideological differences with Gandhi, Bose resigned and left congress. Rajendra Prasad was appointed in his place.
  - He found a new party, '**the Forward Bloc**'. The purpose was to consolidate the political left and major support base in his home state Bengal.
- **Indian National Army:**
  - He reached Japanese-controlled Singapore from Germany in July 1943, issued from there his famous call, '**Delhi Chalo**', and announced the formation of the **Azad Hind Government** and the **Indian National Army** on 21<sup>st</sup> October 1943.
  - The INA was first formed under **Mohan Singh** and Japanese Major Iwaichi Fujiwara and comprised Indian prisoners of war of the British-Indian Army

Note:

captured by Japan in the Malayan (present-day Malaysia) campaign and at Singapore.

- The INA included both, the Indian prisoners of war from Singapore and Indian civilians in South-East Asia. Its strength grew to 50,000.
- The INA fought allied forces in 1944 inside the borders of India in Imphal and in Burma.
- In November 1945, a British move to put the INA men on trial immediately sparked massive demonstration all over the country.

## India Innovation Index 2020: NITI Aayog

### Why in News

Recently, **India Innovation Index Report 2020** was released by **NITI Aayog** in which **Karnataka retained its top position** in the major States category.

### Key Points

- **Categories:** The Innovation Index is divided into three categories—**major states, Union Territories, and hill and North East states.**
- **Major States:**
  - **Top States: Karnataka topped with a score of 42.5** for the second year running.
    - The state's success has been attributed to a high number of **venture capital deals, registered GIs** and **ICT exports**, and high **FDI inflow**.
    - Four southern states – **Karnataka, Tamil Nadu, Telangana and Kerala** —occupy the top positions on the index, apart from **Maharashtra which ranked second.**

### Best performers

Four of the five highest scoring major States in the India Innovation Index are from the south



Rank	Major States	Score
1	Karnataka	42.5
2	Maharashtra	38.03
3	Tamil Nadu	37.91
4	Telangana	33.23
5	Kerala	30.58
6	Haryana	25.81
7	Andhra Pradesh	24.19
8	Gujarat	23.63
9	Uttar Pradesh	22.85
10	Punjab	22.54

- **Bottom States: Jharkhand, Chhattisgarh and Bihar** scored the lowest on the index, which put them at the bottom in the “major States” category.
  - **Bihar raked last** with 14.5 points.
- **Hill and North-East States:**
  - **Himachal Pradesh topped the rankings** of hill and North-East states, followed by Uttarakhand, Manipur and Sikkim.
- **Union territories/Small States:**
  - **Delhi has scored the highest on the index** in the country with a score of 46.6, while **Lakshadweep has the lowest score at 11.7.**

### India Innovation Index

- **Institutions involved:**
  - **NITI (National Institution for Transforming India) Aayog** with the **Institute for Competitiveness.**
- **Modelled on GII:**
  - The index has been developed on the lines of the **Global Innovation Index (GI)**, to ameliorate the innovation ecosystem of Indian states and Union Territories (UTs) and to design policies to drive innovation across regions.
- **Approach:**
  - The index goes beyond traditional approaches by **considering the best parameters in measuring innovation** such as **patents per million of population, publication in scientific journals, percentage of GDP spending on research.**
  - It also adds parameters that are specific to the Indian economy (eg. Demographic dividend), to give it a more holistic coverage.
- **Indicators used:**
  - The indicators that the survey uses includes the level and quality of education on parameters such as:
    - **Number of PhD students** and **knowledge-intensive** employment.
    - Enrolment in **engineering and technology** and number of **highly skilled professionals.**
    - Investment in **R&D** and number of patents and trademark applications filed.
    - **Internet subscribers.**
    - **FDI inflows**, business environment and safety and legal environment.

Note:

- Delhi recorded the highest number of **trademark and patent applications**, along with the establishment of **new start-ups and companies** in the last financial year.

#### ➤ Challenges:

- **Attracting Private Investment in Research:** The **Indian government is a major spender in R&D**, while the investment of the private sector is very low when compared to Israel where private companies account for 70% of private investment in R&D.
- **Bridging North-South Divide:** In the findings of the report the southern states have fared much better than the North Indian states.
  - There is a need to establish to interlink innovative capacities of the states (with differential per capita GDP) to decrease regional disparity in innovation.
  - Best practices observed within the States should often be documented and disseminated to encourage peer-to-peer learning.
- **Need for micro-analysis of State-level policies:** For a country as large as India, the state of innovation needs to be understood at the regional level for effective policy formulation.
  - Based on the index each state needs to formulate its own policy, based on its unique resources and strengths and which caters to its specific needs.

#### ➤ Suggestions:

- **Investing More in research:** India needs to increase its spending on R&D which is around **0.6-0.7% of its GDP**, way below the expenditure level of countries like Israel (4.3%), South Korea (4.2%), the US (2.8%) and China (2.1%).
  - Increased spending on research and development with greater collaboration between the industry and educational institutions may help to enhance innovation capability.
  - It could broaden and improve the capability of top rung educational institutions in the country to produce greater innovation outputs.
- **Establish a Collaborative Platform:** To link all the stakeholders of innovation - innovators, researchers, and investors from the industry, a common platform should be developed.
  - It will help to strengthen the industry-academia linkages and will ease the process of technology transfer by providing a platform for innovators to showcase their inventions.

## Guru Gobind Singh

### Why in News

Recently, the Prime Minister paid homage to **Guru Gobind Singh** on his birth anniversary.

### Key Points

#### ➤ About:

- The **last of the ten Sikh Gurus**, Guru Gobind Singh was born on **22<sup>nd</sup> December, 1666 in Patna, Bihar.**



- His birth anniversary is based on the **Nanakshahi calendar** according to which it will fall on January 20 in 2021 while for the last year, it was celebrated on January 2.
- He **became the Sikh guru at the age of nine**, following the demise of his father, **Guru Tegh Bahadur, the ninth Sikh Guru.**
- He was **assassinated in 1708.**

#### ➤ Contributions:

- **Religious:**
  - He is known for his **significant contributions to the Sikh religion**, including the introduction of the **turban to cover hair.**
  - He also founded the **principles of Khalsa or the Five 'K's.**
    - The Five K's are **kesh** (uncut hair), **kanga** (wooden comb), **kara** (iron or steel bracelet), **kirpan** (dagger) and **kachera** (short breeches).
    - These were the five articles of faith that a **Khalsa must always adorn.**
  - He also laid down many other rules for the Khalsa warriors to follow like **abstaining from tobacco, alcohol, halal meat, etc.** The Khalsa warrior was also duty-bound to **protect innocent people from persecution.**
  - He named **Guru Granth Sahib**, the religious text of the Khalsas and the Sikhs, as the next Guru of the two communities.
- **Martial:**
  - He fought against the Mughals in the battle of Muktsar in 1705.

Note:



- In the Battle of Anandpur (1704), the Guru lost his mother and two minor sons who were executed. His eldest son also died in battle.
- **Literary:**
  - His literary contributions include the **Jaap Sahib, Benti Chaupai, Amrit Savaiye, etc.**
  - He also wrote the **Zafarnama** which was a letter to the Mughal Emperor Aurangzeb.

## Risa: Tripura's Signature Garment

### *Why in News*

The **State government of Tripura** aims to promote **risa nationally** as Tripura's signature garment.

- For this, various initiatives have been taken like **providing risa uniforms to anganwadi and ASHA workers** and facilitating **training for making risa** at Tripura Handloom and Handicrafts Development Corporation.
- The risa is **being branded under the India Handloom Brand**. This supports the **'Vocal for Local' initiative** of the central government.

### *Key Points*

- **About Risa:**
  - Risa is a **handwoven cloth** used as a female upper garment.
  - Risa is a **part of traditional Tripuri attire** that comprises three parts - **risa, rignai and rikutu**.
    - **Rignai:** It is primarily worn as the **lower garment** and literally translates into 'to wear'. It can be understood as an indigenous variety of the **sari** of mainland India.
    - **Rituku:** It is mainly used as a wrap, or like a **'chunri' or a 'pallu'** of the Indian saree.
  - Sometimes, Risa is also used as **headgear, a stole, or a present** to express respect.
- **Cultural Importance:**
  - Adolescent Tripuri girls are first given a risa to wear in an event called **Risa Sormani**, at age 12 to 14.
  - Risa is also used as a **turban by men** during weddings and festivals.



- Risa is **common in almost all 19 indigenous tribal communities** of Tripura. However, **each community has its own designs**.
- It is used in religious festivals such as **Garia Puja** by tribal communities.
  - **Garia Puja Festival:**
    - It is a major **festival in Tripura**, held on the **last day of the month of Chaitra**.
    - Celebrated as a **harvest festival** by the ethnic tribes - **Tripuris and Reangs**.
    - In this festival, the **Garia dance** is also performed.

## Pradhan Mantri Rashtriya Bal Puraskar

### *Why in News*

Recently, 32 children have been awarded the **'Pradhan Mantri Rashtriya Bal Puraskar'** for their exceptional abilities and outstanding accomplishments.

- The Awards are **given by the President of India** in the week **preceding Republic Day (26<sup>th</sup> January)** every year.

### *Key Points*

- **Two Categories:** The Pradhan Mantri Rashtriya Bal Puraskar is given under **two categories**:
  - Bal Shakti Puraskar, and
  - Bal Kalyan Puraskar.
- **Bal Shakti Puraskar:**
  - **Recognition:**
    - It is given by the Government of India every year to recognize exceptional achievements of **children** in various fields i.e., **innovation, scholastic achievements, social service, arts & culture, sports and bravery**.
  - **Eligibility:**
    - A child who is an **Indian Citizen** and **residing in India** and is **between 5-18 years of age**.
  - **Award:**
    - A medal, a cash prize of Rs. 1,00,000, book vouchers worth Rs.10,000, a certificate and citation.
  - **Background:**

Note:



- It was instituted in 1996 as the **National Child Award for Exceptional Achievement**, renamed from 2018 as Bal Shakti Puraskar.
- **Bal Kalyan Puraskar:**
  - **Recognition:**
    - It is given as recognition to **Individuals and Institutions**, who have made an outstanding contribution towards service for children in the field of **child development, child protection and child welfare**.
  - **Eligibility:**
    - An individual **who is an Indian Citizen and residing in India** and should have attained the **age of 18 years or above** (as on 31<sup>st</sup> August of respective year). S/he should have **worked for the cause of children for not less than 7 years**.
    - The **institution should not be entirely funded by the government** and should have been in the **field of child welfare for 10 years** and performing consistently in the field.
  - **Award:**
    - **Three awards** are given in **each of the two categories** - Individual and Institution - along with **cash prizes** (Rs. 1,00, 000 and Rs. 5,00, 000 respectively).
  - **Background:**
    - It was **instituted in 1979 as the National Child Welfare Awards**, renamed from 2018 as Bal Kalyan Puraskar.

## Padma Awards 2021

### Why in News

Recently, the **Padma Awards for the year 2021** were announced on the occasion of **72<sup>nd</sup> Republic Day**.

### Key Points

- **Awardees (2021):**
  - A total of **119 Padma awards** will be conferred, including **7 padma vibhushan, 10 padma bhushan and 102 padma shri**.
- **Few Padma Vibhushan Awardees (out of 7):**
  - **Shri Shinzo Abe** (Japan), **Shri S P Balasubramaniam** (Posthumous), **Dr. Belle Monappa Hegde** (Medicine), **Shri Sudarshan Sahoo** (Art), etc.

- **Few Padma Bhushan Awardees (out of 10):**
  - **Ms. Krishnan Nair Shantakumari Chithra**, **Shri Tarun Gogoi**, **Ms. Sumitra Mahajan**, **Shri Ram Vilas Paswan**, etc.
- **Few Padma Shri Awardees (out of 102):**
  - **Shri Gulfam Ahmed** (Art), **Ms. P. Anitha** (Sports), **Shri Rama Swamy Annavarapu** (Art), etc.
- **Background:**
  - The Padma Awards are announced annually on the **Republic Day** (26<sup>th</sup> January).
  - Instituted in **1954**, it is **one of the highest civilian honours** of India.
- **Objective:**
  - The Award seeks to recognize achievements in all fields of activities or disciplines where an **element of public service is involved**.
- **Categories:**
  - The Awards are given in three categories:
    - **Padma Vibhushan** (for exceptional and distinguished service),
    - **Padma Bhushan** (distinguished service of higher-order) and
    - **Padma Shri** (distinguished service).
  - **Padma Vibhushan is highest in the hierarchy of Padma Awards** followed by Padma Bhushan and Padma Shri.
- **Disciplines:**
  - The Awards are given in various disciplines/ fields of activities, viz.- **art, social work, public affairs, science and engineering, trade and industry, medicine, literature and education, sports, civil service** etc.

### Bharat Ratna

- Bharat Ratna is the highest civilian award of the country.
- It is awarded in recognition of exceptional service/ performance of the **highest order in any field of human endeavour**.
- It is treated on a different footing from Padma Award. The recommendations for Bharat Ratna are **made by the Prime Minister to the President of India**.
- The number of Bharat Ratna Awards is restricted to a **maximum of three** in a particular year.

Note:

➤ **Selection Process:**

- **Padma Awards Committee:** The Awards are conferred on the recommendations made by the Padma Awards Committee, which is **constituted**

**by the Prime Minister** every year.

- **Awarded by President:** The awards are presented by the President of India usually in the month of March/April every year.



Note:



