



AUGUST 2019

IASBABA'S MONTHLY MAGAZINE

**Inter-State river water disputes
Article 370 - Jammu & Kashmir
Consumer Protection Bill 2019
National Medical Commission (NMC)
Global recession and slowdown
Water governance strategies**

www.iasbaba.com

PREFACE

With the present shift in examination pattern of UPSC Civil Services Examination, 'General Studies – II and General Studies III' can safely be replaced with 'Current Affairs'. Moreover, following the recent trend of UPSC, almost all the questions are issue-based rather than news-based. Therefore, the right approach to preparation is to prepare issues, rather than just reading news.

Taking this into account, our website www.iasbaba.com will cover current affairs focusing more on 'issues' on a daily basis. This will help you pick up relevant news items of the day from various national dailies such as The Hindu, Indian Express, Business Standard, LiveMint, Business Line and other important Online sources. Over time, some of these news items will become important issues.

UPSC has the knack of picking such issues and asking general opinion based questions. Answering such questions will require general awareness and an overall understanding of the issue. Therefore, we intend to create the right understanding among aspirants – 'How to cover these issues?'

This is the 51st edition of IASbaba's Monthly Magazine. This edition covers all important issues that were in news in the month of **AUGUST 2019** which can be accessed from <https://iasbaba.com/current-affairs-for-ias-upsc-exams/>

VALUE ADDITIONS FROM IASBABA

- **Must Read and Connecting the dots.**
- **Also, we have introduced Prelim and mains focused snippets and Test Your Knowledge (Prelims MCQs based on daily current affairs) which shall guide you for better revision.**
- **'Must Read' section**, will give you important links to be read from exam perspective. This will make sure that, you don't miss out on any important news/editorials from various newspapers on daily basis.
- Under each news article, **'Connecting the dots'** facilitates your thinking to connect and ponder over various aspects of an issue. Basically, it helps you in understanding an issue from multi-dimensional view-point. You will understand its importance while giving Mains or Interview.

Must Read Articles: We have not included them in the magazine. Those following DNA on daily basis may follow it- <https://iasbaba.com/current-affairs-for-ias-upsc-exams/>

"Tell my mistakes to me not to others, because these are to be corrected by me, not by them."

CONTENTS

| | |
|--|---------------|
| HISTORY/CULTURE/GEOGRAPHY | 8 |
| Indus Script | 8 |
| Uranium mining | 9 |
| Kutch Desert..... | 9 |
| Kajin Sara lake | 10 |
| Perseids Meteor shower | 11 |
| POLITY/GOVERNANCE | 12 |
| Article 370 | 12 |
| Article 371F | 15 |
| Inter-State river water disputes..... | 16 |
| River inter-linking..... | 17 |
| Legal rights to water bodies..... | 18 |
| How states are split into seats | 19 |
| How an Indian citizen is defined | 22 |
| Triple Talaq Act | 25 |
| Consumer Protection Bill | 26 |
| Consumer protection bill 2019 | 26 |
| Prevention of money laundering act (PMLA)..... | 29 |
| Competition Law Review | 29 |
| Aadhaar-social media profile linking..... | 30 |
| Legislative Councils | 31 |
| SOCIAL ISSUE/WELFARE | 32 |
| The taproot of conservation justice | 32 |
| Census 2021 | 35 |
| Sex-ratio at birth | 36 |
| Fertility rate..... | 37 |
| UN Population report..... | 37 |
| Reservations in Chhattisgarh | 39 |
| Urbanise India to eliminate poverty | 39 |
| The ‘Kerala Model’ is unsustainable | 42 |
| Child well-being index..... | 43 |
| Reconstituting and Reforming the Law Commission of India | 44 |

| | |
|---|-----------|
| WOMEN ISSUE | 46 |
| Surrogacy (regulation) bill, 2019..... | 46 |
| The Surrogacy (Regulation) Bill, 2019 | 46 |
| Abortion | 49 |
| | |
| HEALTH ISSUE | 51 |
| National Medical Commission (NMC)..... | 51 |
| National Medical Commission(NMC)bill 2019 | 51 |
| National Essential Diagnostics List (NEDL) | 53 |
| Measles | 54 |
| Drug resistant TB..... | 56 |
| Multidrug-resistant TB (MDR-TB) & Extensively drug-resistant TB (XDR-TB)..... | 56 |
| Every child to get Rotavirus vaccine | 57 |
| PM-JAY | 59 |
| Notifiable disease..... | 59 |
| How yoga can boost exports..... | 61 |
| Cardiovascular disease burden (CVD) | 63 |
| Anti-microbial resistance | 64 |
| Jan Aushadhi Sugam | 65 |
| Fit India Movement..... | 65 |
| | |
| GOVERNMENT SCHEMES | 67 |
| Institutions of Eminence | 67 |
| Resource Assistance for Colleges with Excellence (RACE) | 68 |
| NISHTHA | 68 |
| One Nation-one Ration Card scheme | 68 |
| One Nation, One Ration Card (ONORC) | 69 |
| Swachh Survekshan Grameen..... | 70 |
| Tax Administration | 70 |
| Aadhaar – social media link | 71 |
| Sabka Vishwas Scheme | 75 |
| Ordnance factory Board (OFB)..... | 75 |
| Swatantra Sainik Samman Pension Scheme | 76 |
| National Digital Library(NDL) | 76 |
| Compensatory Afforestation Fund (CAF)..... | 77 |
| Angikaar campaign..... | 78 |
| | |
| INTERNATIONAL | 80 |

| | |
|---|----|
| US says China manipulates Yuan | 80 |
| Iran-West tensions | 81 |
| Financial Action Task Force (FATF)..... | 82 |
| Talking trade with the EU..... | 83 |
| Eastern Economic Forum (EEF) | 85 |

INDIA AND THE WORLD 88

| | |
|---|----|
| Fortifying the Africa outreach..... | 88 |
| India-Bhutan..... | 90 |
| India-Bahrain ties | 90 |
| Know India programme (KIP) | 91 |
| Letting the pearl on the Silk Road shine brighter | 92 |
| India-G7..... | 94 |

ECONOMY..... 98

| | |
|--|-----|
| Equalization Levy..... | 98 |
| Micro- Small and Medium Enterprises (MSMEs)..... | 98 |
| Explaining the Asian rate cuts wave | 103 |
| RBI's monetary policy | 105 |
| Economic milestone and a poignant anniversary | 109 |
| Global recession..... | 112 |
| Repo-linked deposit and lending rates | 113 |
| Regulatory sandbox | 114 |
| Corporate Social Responsibility (CSR) | 115 |
| Geographical indication and its benefits | 115 |
| Geographical indication (GI) | 118 |
| Direct Tax Code 2.0 | 118 |
| Bonds, yields, and inversions | 119 |
| New FPI norms by SBI | 121 |
| Nirmala Sitharaman's measures to revive economic growth..... | 123 |
| RBI transfer surplus to government of India..... | 125 |
| Foreign Direct Investment(FDI)..... | 126 |
| New FDI Norms | 127 |
| Mergers of Public sector banks(PSB) | 129 |
| The public sector bank merger | 130 |

AGRICULTURE 132

| | |
|----------------------------|-----|
| Concept of Farm ponds..... | 132 |
| From Plate to Plough | 133 |
| Uber for tractors | 136 |

| | |
|--|------------|
| ENVIRONMENT/POLLUTION | 139 |
| Draft national resource efficiency policy | 139 |
| Coal Plants and green norms | 139 |
| Coastal zone management..... | 140 |
| Centre unveils plan for coastal zone management | 140 |
| Biodegradable Plastics | 143 |
| Plastic Pollution..... | 144 |
| Waste Recycling | 146 |
| Water governance strategies..... | 147 |
| India's water scarcity challenge | 149 |
| A jan andolan for water | 150 |
| Composite Water Management Index 2.0..... | 152 |
| Report by IPCC | 153 |
| Arctic wildfires | 156 |
| Paddy stubble burning..... | 157 |
| Sulphur dioxide Pollution..... | 158 |
| Lake Conservation..... | 159 |
| Amazon Wildfires..... | 159 |
| Why Amazon fires are worrying | 160 |
| How govts set climate targets..... | 163 |
| Bonn Challenge | 165 |
| Marine Fisheries Regulation and Management (MFRM) Bill 2019..... | 166 |
| | |
| ANIMALS/NATIONAL PARKS IN NEWS..... | 168 |
| Giant parrots | 168 |
| Tardigrades | 168 |
| Translocation of Wild Buffaloes..... | 168 |
| Conservation of Otters..... | 169 |
| | |
| INFRASTRUCTURE/ENERGY | 171 |
| Solar energy-KUSUM scheme | 171 |
| Renewable hybrid energy systems as a game changer | 173 |
| State rooftop solar attractiveness Index (SARAL) | 174 |
| Electric Vehicles | 175 |
| OCEAN ENERGY..... | 175 |
| Giving wings to better air connectivity | 176 |
| | |
| SCIENCE AND TECHNOLOGY..... | 179 |

| | |
|--|------------|
| Space Commerce | 179 |
| Parker Solar Probe | 179 |
| Chimera | 180 |
| Genome India initiative..... | 180 |
| Reusable Launch System..... | 181 |
| Rooting AI in ethics | 181 |
| Akademik Lomonosov..... | 183 |
| Fedor | 184 |
| Xenotransplantation | 185 |
| Sisir Kumar Mitra | 185 |
| DISASTER MANAGEMENT | 188 |
| National Crisis Management Committee..... | 188 |
| World Youth Conference on Kindness | 188 |
| Coalition for Disaster Resilient Infrastructure (CDRI) | 189 |
| DEFENCE/INTERNAL SECURITY/SECURITY | 191 |
| Quick reaction surface-to-air missiles (QRSAM)..... | 191 |
| Chief of Defence Staff | 191 |
| Office of the Chief of Defence Staff | 192 |
| Mob lynching | 194 |
| J&K and the world..... | 197 |
| Dixon Plan of 1950 | 198 |
| Register of Indigenous Inhabitants of Nagaland (RIIN)..... | 199 |
| Naga Peace Process | 199 |
| Chasing peace in Nagaland | 200 |
| Privacy no longer supreme | 202 |
| MISCELLANEOUS..... | 204 |
| (TEST YOUR KNOWLEDGE) | 206 |
| 2019 AUGUST MONTH CURRENT AFFAIRS MCQs SOLUTIONS..... | 224 |



IASBABA

Admission open for 2019-20

One stop for your UPSC / IAS
preparation.

INTEGRATED LEARNING PROGRAM (ILP)
(FOR FRESHERS / WORKING
PROFESSIONALS/VETERANS)
THE MOST COMPREHENSIVE SUPPORT
FOR UPSC PREPARATION.
USEFUL FOR PRELIMINS / MAIN WITH
MAXIMUM PROBABILITY RATIO.

You can reach us at - 090350 77800

Or visit us at - www.iasbaba.com or



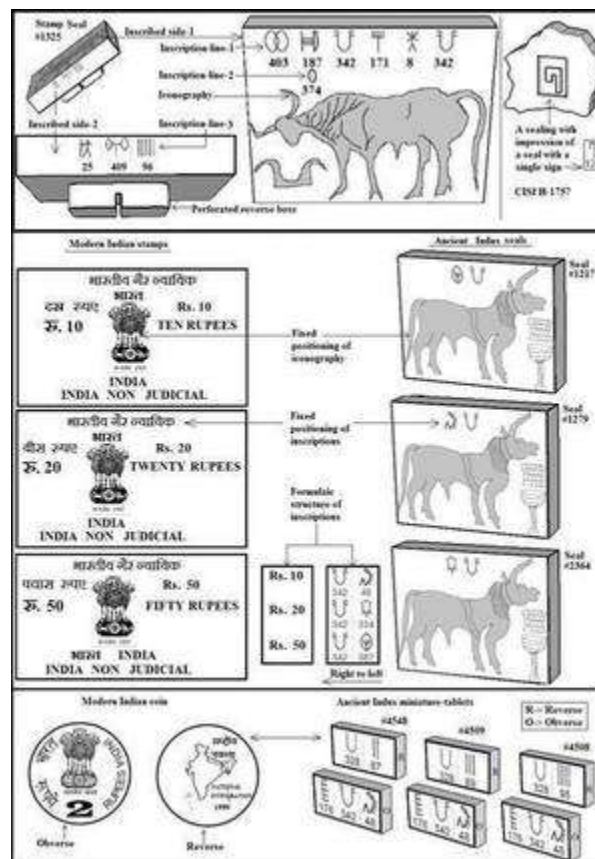
HISTORY/CULTURE/GEOGRAPHY

Indus Script

Part of: GS Prelims and Mains GS I- Indian Culture

In News

- Discovered from nearly 4,000 ancient inscribed objects, including seals, tablets, ivory rods, pottery shards, etc., **the Indus inscriptions** are one of the most enigmatic legacies of the Indus Valley civilization
- They have **not been deciphered** due to the absence of bilingual texts, extreme brevity of the inscriptions, and ignorance about the language(s) encoded by Indus script.
- A new research says that a majority of these inscriptions were **written logographically** (by using word signs) and not by using phonograms (speech sounds units)
- The inscribed seals and tablets were used in some administrative operation that controlled the commercial transactions prevalent in the trade-savvy settlements of the ancient Indus valley Civilisation.
- The research points out that the inscriptions can be **compared to the structured messages found on stamps, coupons, tokens and currency coins of modern times.**



https://www.thehindu.com/society/history-and-culture/il8bbi/article28787526.ece/ALTERNATES/FREE_460/2th-HinduFig

Uranium mining

Part of: GS Prelims and Mains GS I – Resource distribution

In News

- Joint Forum for People’s Democratic Rights, a civil society group, is protesting against Uranium mining in **Nallamala ranges in Andhra Pradesh**.
- Protestors say Uranium mining in the forests would inevitably damage the delicate ecology of the region, and claimed that **Chenchu tribes** of the region would be immediately affected.
- The waste is generally buried inside the earth. However, protestors allege government is doing a sub-par job at management and the waste is exposed to human beings and ecology
- The rains in Nallamala will inevitably end up in Krishna River. If any of the waste washes down into the river, it will pollute the river to a large extent

Do You Know?

- Jaduguda in Singhbhum Thrust Belt (in the state of Jharkhand) is the first uranium deposit to be discovered in India in 1951.
- Only 3% of power in the country is provided by uranium.
- Largest viable deposits are found in **Australia, Kazakhstan, and Canada**.
- The Chu-Sarysu basin in central Kazakhstan; Olympic Dam and the Ranger mine in Southern Australia are some of important mines in world.
- High-grade deposits are only found in the **Athabasca Basin** region of Canada.

Kutch Desert

Part of: GS Prelims and GS Mains I – Ancient History

In News

- A recent study has shown that the hot arid desert of **Kutch was once a humid sub-tropical forest** with a variety of birds, freshwater fish and possibly giraffes and rhinos.
- The fossils, consisting mostly of ribs, and parts of teeth and bones, were unearthed from **Palasava village of Rapar taluk in Kutch, Gujarat**.
- Overall, the fossil finds from Palasava suggest that a rich diversity of fauna and flora sustained in warm, humid/wet, tropical to sub-tropical environmental conditions during the **Middle Miocene (14 Million years ago)**

- The bulk of fossils unearthed in Kutch have so far been mainly marine organisms, due to their proximity to the Arabian Sea.
- Geological changes eventually closed off the salt-flats' connection to the sea and the region turned into a large lake, eventually becoming salty wetlands.
- **Significance of the findings**
 - Kutch is a potential treasure trove of mammal fossils with possible continuity to vertebrate fossils in the Siwalik, spanning Pakistan to Nepal.
 - It also points to clues on how mammals dispersed between Africa and the Indian subcontinent when part of India was in the Gondwanaland supercontinent that existed nearly 300 million years ago.

Kajin Sara lake

Part of: GS Prelims

In News

- A newly-discovered lake in Nepal is likely to set a new record of being the world's highest lake
- As per the measurement of the lake taken by the team, it is located at an altitude of 5,200 metres, which is yet to be officially verified. It is estimated to be 1,500-metre-long and 600-metre-wide.
- Currently Tilicho Lake holds the title of the world's highest lake. it is situated at an altitude of 4,919 metres in Nepal.

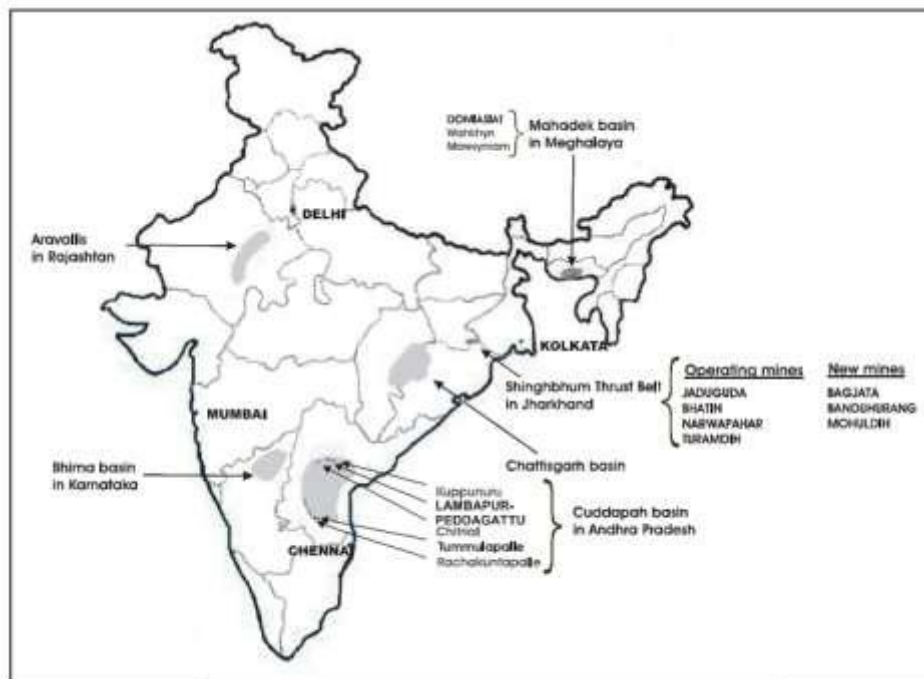


Fig. 1

Major uranium provinces of India

<http://www.ucil.gov.in/pdf/myth/Emerging%20trend%20in%20U%20mining.pdf>

Perseids Meteor shower

Part of: GS Prelims and Mains GS-I - Geography

In News

- The Perseid meteors appears as streaks of light in the sky.
- These start around every year around late July and will peak on August 12 night to August 13.
- The meteor shower appears as the Earth passes through the **cosmic dust left by the comet Swift-Tuttle**.
- The Perseids are widely sought after by astronomers and stargazers because most years at its peak, one can see 60 to 100 meteors in an hour from a dark place.
- They are visible in the Northern Hemisphere and **can be viewed in skies all across**.
- As NASA explains, Meteor showers take their name from the location of the radiant. The Perseid radiant is in the constellation **Perseus**.
- For example, the Geminid meteor shower, which is observed each December, is named for a radiant in the constellation Gemini.



POLITY/GOVERNANCE

Article 370

Context

- Jammu and Kashmir has lost its special status, and reduced to two Union Territories
- Special status was withdrawn by invoking the same Article 370 which had been seen as firewalling the autonomy of Jammu and Kashmir.

What is the significance of Article 370?

- The most important feature of federalism in the United States was the “compact” between the 13 erstwhile British colonies that constituted themselves first into a confederation and then into a federal polity under the country’s 1791 constitution.
- India’s Supreme Court in *State of West Bengal v. Union of India* (1962) attached the highest importance to an “agreement or compact between states” as an essential characteristic of federalism.
- In *SBI* (2016), the apex court accepted the presence of this compact for Kashmir.
- Article 370 was an essential facet of India’s federalism because, like the compact in the United States, it governed the relationship of the Union with Jammu and Kashmir.
- The Supreme Court has held federalism to be part of the basic structure of India’s Constitution
- The original draft of Article 370 was drawn up by the Government of Jammu and Kashmir.
- A modified version of the draft was passed in the Constituent Assembly of India on May 27, 1949. Moving the motion, N Gopalaswami Ayyangar said that if the accession was not ratified by a plebiscite, “we shall not stand in the way of Kashmir separating herself away from India”.
- On October 17, 1949, Article 370 was included in India’s Constitution by the Constituent Assembly. Some critics of Article 370 have argued earlier that Kashmir joined India in 1947 without any conditions, and Article 370 unnecessarily gave it special status.
- However, the drafting of the Constitution ended on November 26, 1949 — Article 370 had been included before the Constitution was adopted.

What did the Instrument of Accession say?

- The Indian Independence Act, 1947, divided British India, i.e., the territories under the direct administration of the British, into India and Pakistan.
- The 580-odd princely states that had signed subsidiary alliances with the British had their sovereignty restored to them, and were given the options of remaining independent, joining the Dominion of India, or joining the Dominion of Pakistan.
- Section 6(a) of the Act said joining either India or Pakistan would have to be through an Instrument of Accession.

- States could specify the terms on which they were joining one of the new dominions. Technically, therefore, the Instrument of Accession was like a treaty between two sovereign countries that had decided to work together.
- The maxim of *pacta sunt servanda* in international law, which governs contracts or treaties between states, asks that promises must be honoured.
- Monday's Presidential Order under Article 370 is a negation of the constitutional pact that India signed with Maharaja Hari Singh.
- The Maharaja, the Hindu king of a Muslim-majority state, had initially wanted to stay independent. He signed the Instrument of Accession on October 26, 1947, after Afridi tribesmen and Pakistan Army regulars invaded the state, and India agreed to help only after he acceded.
- The Schedule appended to the Instrument of Accession gave the Indian Parliament power to legislate for Jammu and Kashmir on only defence, external affairs and communications.
- Article 370 was a constitutional recognition of the conditions mentioned in the Instrument of Accession, and reflected the contractual rights and obligations of the two parties.

But wasn't Article 370 just a temporary provision?

- Article 370 is the second Article of Part XXI of India's Constitution, which is titled "Temporary, Transitional and Special Provisions". Article 370 was temporary in the sense that the Constituent Assembly of Jammu and Kashmir was given the right to modify/delete/retain it. The Constituent Assembly of Kashmir decided in its wisdom to retain it.
- The other view was that it was "temporary" until a plebiscite had been held to ascertain the wishes of the people of Jammu and Kashmir. In a written reply to Parliament last year, the government had said there was no proposal to remove Article 370.
- In *Kumari Vijayalakshmi Jha vs Union Of India (2017)*, Delhi High Court rejected a petition that argued that Article 370 was temporary, and that its continuation was a fraud on the Constitution.
- In April 2018, the Supreme Court said that the word "temporary" in the headnote notwithstanding, Article 370 was not temporary.
- In *Santosh Kumar (2017)*, the apex court said that due to historical reasons, Jammu and Kashmir had a special status.
- The Supreme Court in *SBI v Zaffar Ullah Nehru (2016)* observed that the federal structure of the Constitution is reflected in Part XXI. The court also said that J&K has a special status, and that Article 370 was not temporary. The court referred to Article 369 of Part XXI that specifically mentions the period of five years; no time limit is mentioned in Article 370. The court observed that Article 370 cannot be repealed without the concurrence of the Constituent Assembly of Jammu and Kashmir.
- In *Prem Nath Kaul (1959)*, a five-judge Bench of the Supreme Court observed that Article 370(2) shows that the continuance of the exercise of powers conferred on Parliament and the President by the relevant temporary provisions of Article 370(1) is made conditional on the final approval of the Constituent Assembly of Jammu and Kashmir.

- In Sampat Prakash (1968), the apex court decided that Article 370 could be invoked even after the dissolution of the Constituent Assembly of Jammu and Kashmir. “Article 370 has never ceased to be operative,” the five-judge Bench said.

Has Article 370 been scrapped?

- The Constitution (Application to Jammu and Kashmir) Order, 2019, issued by President Ram Nath Kovind “in exercise of the powers conferred by Clause (1) of Article 370 of the Constitution”, has not abrogated Article 370.
- While this provision remains in the statute book, it has been used to withdraw the special status of Jammu and Kashmir.
- The Presidential Order has extended all provisions of the Indian Constitution to Jammu and Kashmir. It has also ordered that references to the Sadr-i-Riyasat of Jammu and Kashmir shall be construed as references to the Governor of the state, and “references to the Government of the said State shall be construed as including references to the Governor of Jammu and Kashmir acting on the advice of his Council of Ministers”.
- This is the first time that Article 370 has been used to amend Article 367 (which deals with Interpretation) in respect of Jammu and Kashmir, and this amendment has then been used to amend Article 370 itself.

What is the status of Article 35A now?

- Article 35A stems from Article 370, and was introduced through a Presidential Order in 1954. Article 35A does not appear in the main body of the Constitution — Article 35 is followed by Article 36 — but appears in Appendix I. Article 35A empowers the Jammu and Kashmir legislature to define the permanent residents of the state, and their special rights and privileges.
- Presidential Order has extended all provisions of the Constitution to Jammu and Kashmir, including the chapter on Fundamental Rights.
- Therefore, the discriminatory provisions under Article 35A are now unconstitutional. The President may also withdraw Article 35A.

What has changed in Jammu and Kashmir?

- The state of Jammu and Kashmir will now cease to exist; it will be replaced by two new Union Territories: Jammu and Kashmir, and Ladakh. UTs have become states earlier; this is the first time that a state has been converted into a UT. The UT of Jammu and Kashmir will have an Assembly, like in Delhi and Puducherry.
- Not only has Jammu and Kashmir lost its special status, it has been given a status lower than that of other states. Instead of 29, India will now have 28 states. Kashmir will no longer have a Governor, rather a Lieutenant Governor like in Delhi or Puducherry.

Can the Presidential Order be challenged in the Supreme Court? On what grounds?

- It will most likely be challenged. However, the Supreme Court will consider that Article 370 does, indeed, give sweeping powers to the President. It might also take two to three years for a Constitution Bench of the court to decide such a challenge.

- The possible grounds of challenge could include the argument that the conversion of Jammu and Kashmir into a Union Territory is in violation of Article 3, as the Bill was not referred by the President to the state Assembly. Also, can the Constituent Assembly mean Legislative Assembly? Are the Governor and the state government one and same?
- The constitutional relevance of Instrument of Accession will also be examined by the court. Whether Article 370 was part of the basic structure will likely be considered. The use of Article 367 in amending Article 370 will also be examined.

How would the status of J&K as a Union Territory (and Ladakh too as a non-legislature UT) affect the governance of these States?

- There are two models – Puducherry and the National Capital Territory of Delhi - which can guide the proposed Legislative Assembly of Jammu and Kashmir on becoming a Union Territory.
- While the former seems to be having no restriction with regard to framing laws on police, public order and land, the latter is specifically barred from making laws on the three subjects.
- It was through an enabling provision – 239 A - that the Puducherry legislature was formed, whereas, in the case of Delhi, the provision – 239AA – spells out the contours of powers of the legislature and council of ministers.
- In respect of Ladakh, where there is no Legislative Assembly, the role of the Administrator or Lt. Governor will be greater than that of Jammu & Kashmir. His source of authority is the President.

Conclusion:

- Article 370 is the bedrock of the constitutional relationship between Jammu and Kashmir and the rest of India.
- It has been described as a tunnel through which the Constitution is applied to J&K.
- India has used Article 370 at least 45 times to extend provisions of the Indian Constitution to J&K. This is the only way through which, by mere Presidential Orders, India has almost nullified the effect of J&K's special status
- Thus, the move is bound to have a significant impact on the demography, culture, and politics of J&K.

Connecting the dots:

1. Discuss the history of Article 370?
2. Violence, terrorism, and killings are never the answer – be it on any side. What do you think?
3. Discuss government's strategy towards handling the Kashmir issue.

[Article 371F](#)

Part of: GS Prelims and Mains GS II – Indian Federalism

In News

- Sikkim CM assures people of state that Centre will not interfere with Article 371F and also rejected any possibility of merger of Sikkim and Darjeeling hills,
- Article 371F of the Constitution, is the result of the agreement in 1975 between the Union of India, the king of Sikkim and the State's political parties
- Article 371F (36th Amendment Act, 1975): To protect the rights and interests of various sections of the population of Sikkim, Parliament may provide for the number of seats in the Assembly to be filled only by candidates from those sections

Do You know?

- **Articles 369 through 392** (including some that have been removed) appear in Part XXI of the Constitution, titled 'Temporary, Transitional and **Special Provisions**'.
- Article 370 dealt with 'Temporary Provisions with respect to the State of Jammu and Kashmir' which was read down recently by Presidential order.
- Article 371, Maharashtra and Gujarat: Governor has "special responsibility" to establish "separate development boards" for "Vidarbha, Marathwada, and the rest of Maharashtra", and Saurashtra and Kutch in Gujarat.
- Articles 371A through 371J were incorporated subsequently.
- Article 371A (13th Amendment Act, 1962), Nagaland
- Article 371B (22nd Amendment Act, 1969), Assam
- Article 371C (27th Amendment Act, 1971), Manipur
- Article 371D (32nd Amendment Act, 1973, Andhra Pradesh and Telangana
- Article 371E: it allows for the establishment of a university in Andhra Pradesh by a law of Parliament. But this is not a "special provision" in the sense of the others in this part.
- Article 371G (53rd Amendment Act, 1986), Mizoram
- Article 371H (55th Amendment Act, 1986), Arunachal Pradesh
- Article 371J (98th Amendment Act, 2012), Karnataka
- Article 371I deals with Goa, but it does not include any provision that can be deemed 'special'.

Inter-State river water disputes

Part of: GS Prelims and Mains GS- II - issues and challenges pertaining to the federal structure; Inter-State relations

In News

- Lok Sabha passed a bill to establish a **single central tribunal for inter-state water disputes** in place of the numerous existing ones so as to speed up resolution process
- The tribunal can set up multiple benches for different disputes
- **Composition of Central tribunal** – Chairperson (retired SC judge), a vice-chairperson, three judiciary members and three experts.
- **Appointment of tribunal members** - by the Central government on recommendation of a selection committee comprising the PM, CJI and ministers of law & justice and Jal Shakti

- The bill proposes to set up a **dispute resolution committee of experts**, headed by a secretary-level officer of the government.
- Once a dispute arises, it would be referred to this committee, which would have a year to resolve it, with an extension of six months
- If the committee fails to arrive at a conclusion, the matter would be referred to a Central tribunal whereby **final award will be delivered in two years** and whenever it gives the order, the verdict will be notified automatically.
- The **decision** of the tribunal would **be binding on states** and have the "same force as an order of the Supreme Court"

Concerns raised by Opposition

- A major concern has been over **data collection** from river basins, the core of adjudication.
- **Centralization of powers** as the selection committee to recommend tribunal members does not have any representation from the States

Do you know?

- India has 18 % of the world's population but only 4% replenishable water
- At present, there are nine tribunals including those on Cauvery, Mahadayi, Ravi and Beas, Vansadhara and Krishna river.
- Of the nine tribunals set up to adjudicate such disputes, only four have given their awards and the time taken to do so ranged from seven to 28 years
- Centre has constituted a **National Water Informatics Centre** on March 2018, which will collate data from all organizations including the Central Water Commission, IMD and state departments.

River inter-linking

Part of: GS Prelims and Mains GS- II - Government policies and interventions for development in various sectors and issues arising out of their design and implementation.

In News

- Tamil Nadu has been allotted 83 thousand million cubic feet (tmcft) of water under the proposed **Godavari-Cauvery link**, according to a draft detailed project report
- The report was prepared by National Water Development Agency (NWDA), a Central government organisation entrusted with the task of preparing proposals for linking rivers.
- As per the current NWDA proposal, a total of 247 tmcft is sought to be diverted from the Godavari, through the Krishna river, to the Pennar basin.
- As much as 163 tmcft will be set apart for Andhra Pradesh and Telangana, and the balance will be given to Tamil Nadu.
- The report, which has been circulated to the States concerned for views, has not provided comfort to Tamil Nadu which has been demanding 200 tmcft of water

Legal rights to water bodies

Context:

- Giving legal rights to water bodies a great leap forward

There are many more than seven rivers in India. Since there is no proper definition of a river, it is impossible to answer this question. One way to list is in terms of river basins, so that the main river and its tributaries are both included. For Himalayan Rivers, one will then list Indus basin, Ganga basin, Brahmaputra basin, Barak basin and so on.

Similarly, in the south, one will list basins of rivers flowing east (Godavari, Krishna, Kaveri, Mahanadi) and those flowing west (Narmada, Tapti). This still leaves some loose ends, minor rivers along the coast and rivers that don't drain into oceans.

Depending on what is included, there can be more than 100 river basins and more than 600 rivers in the listing.

Rivers now have legal rights.

Background:

- In a way, it started with some rivers in Victoria. Then, in 2017, we had the Whanganui river in New Zealand and Ganga and Yamuna.
- Because of news reports, most people know what the Uttarakhand High Court said in March 2017, though there is now a stay because of an appeal before the Supreme Court.
- All the Hindus have deep Astha in rivers Ganga and Yamuna, and they collectively connect with these rivers
- Accordingly, while exercising the parens patrie jurisdiction, the Rivers Ganga and Yamuna, all their tributaries, streams, every natural water flowing with flow continuously or intermittently of these rivers, are declared as juristic/legal persons/living entities having the status of a legal person with all corresponding rights, duties and liabilities of a living person in order to preserve and conserve river Ganga and Yamuna
- The Director NAMAMI Gange, the Chief Secretary of the State of Uttarakhand and the Advocate General of the State of Uttarakhand are hereby declared persons in loco parentis as the human face to protect, conserve and preserve Rivers Ganga and Yamuna and their tributaries.
- These Officers are bound to uphold the status of Rivers Ganges and Yamuna and also to promote the health and well-being of these rivers." Ganga and Yamuna obtained legal rights, but as minors. They needed guardians. Granting legal rights to rivers (and water bodies) opens up a new area of environmental jurisprudence.

Why did Ganga and Yamuna need legal rights?

- The core issue is pollution.
- Central Pollution Control Board (CPCB) brings out reports on water quality in our rivers. Strictly speaking, these are measures of water quality along stretches of rivers.

- There is actually a hierarchy of pollution, based on levels of biochemical oxygen demand (BOD). One can legitimately argue BOD is at best a partial indicator. T
- There are other measures of a river's well-being. If BOD values exceed 8 milligrams per litre, the river will be regarded as severely polluted. Between Wazirabad and Okhla, Yamuna has a BOD level of 32, 55 and 70, at three different places. Between Kala Amb and Narayan Garh, Markanda river in Haryana has a BOD value of 590.
- Similarly, there are also lists of most polluted rivers in India and these lists will typically include Ganga, Yamuna, Sabarmati, Oshiwara and Damodar. More often than not, these lists are based on CPCB findings and therefore mean stretches of rivers, not entire rivers.
- Somewhat more rarely, there are also lists of cleanest rivers in the world and cleanest rivers in India. For instance, stretches of Chambal, Narmada, Brahmaputra, Umngot, Teesta and Tuipui are remarkably clean.

What is the reason of ill-being of rivers?

- Ill-being of rivers is primarily due to raw sewage and industrial waste. Neither problem is new. In Britain, a Royal Commission on Sewage Disposal was established in 1898. Between 1901 and 1915, this produced ten reports
- Kashi Ganga Prasadini Sabha, established by concerned citizens of Varanasi in 1886. The Sabha's objective was to introduce drainage and clean up the river.
- The Royal Commission and Namami Gange are primarily about what government does. (Namami Gange does have a public awareness component.) The Sabha was about what citizens did and in addition to the government bit, the citizen bit is also needed.

Connecting the dots:

1. Why haven't the efforts to clean the polluted rivers in India succeeded so far? Examine by taking the case study of the river Ganga?
2. Do you think according the status of 'living entity' to rivers would help in their rejuvenation? Critically analyse.

[How states are split into seats](#)

Context:

- With J&K reorganised, all eyes are on how Election Commission will proceed with delimitation of constituencies
- Since the bifurcation of Jammu and Kashmir state into the Union Territories of J&K and Ladakh, delimitation of their electoral constituencies has been inevitable. While the government has not formally notified the Election Commission yet, the EC has held "internal discussions" on the Jammu and Kashmir Reorganisation Act, 2019, particularly its provisions on delimitation.

What is Delimitation?

- Delimitation is the act of redrawing boundaries of Lok Sabha and state Assembly seats to represent changes in population. In this process, the number of seats allocated to different states in Lok Sabha and the total number seats in a Legislative Assembly may also change.

Objective of delimitation

- The main objective of delimitation is to provide equal representation to equal segments of a population.
- It also aims at a fair division of geographical areas so that one political party doesn't have an advantage over others in an election.
- Delimitation is carried out by an independent Delimitation Commission.
- The Constitution mandates that its orders are final and cannot be questioned before any court as it would hold up an election indefinitely.

How is delimitation carried out?

- Under Article 82, the Parliament enacts a Delimitation Act after every Census. Once the Act is in force, the Union government sets up a Delimitation Commission made up of a retired Supreme Court judge, the Chief Election Commissioner and the respective State Election Commissioners.
- The Commission is supposed to determine the number and boundaries of constituencies in a way that the population of all seats, so far as practicable, is the same.
- The Commission is also tasked with identifying seats reserved for Scheduled Castes and Scheduled Tribes; these are where their population is relatively large.
- All this is done on the basis of the latest Census and, in case of difference of opinion among members of the Commission, the opinion of the majority prevails.
- The draft proposals of the Delimitation Commission are published in the Gazette of India, official gazettes of the states concerned and at least two vernacular papers for public feedback.
- The Commission also holds public sittings. After hearing the public, it considers objections and suggestions, received in writing or orally during public sittings, and carries out changes, if any, in the draft proposal. The final order is published in the Gazette of India and the State Gazette and comes into force on a date specified by the President.

How often has delimitation been done in the past?

- The first delimitation exercise in 1950-51 was carried out by the President (with the help of the Election Commission), as the Constitution at that time was silent on who should undertake the division of states into Lok Sabha seats.
- This delimitation was temporary as the Constitution mandated redrawing of boundaries after every Census. Hence, delimitation was due after the 1951 Census. Pointing out that the first delimitation had left many political parties and individuals unhappy, the EC advised the government that all future exercises should be carried out by an independent commission.
- This suggestion was accepted and the Delimitation Commission Act was enacted in 1952. Delimitation Commissions have been set up four times — 1952, 1963, 1973 and 2002 under the Acts of 1952, 1962, 1972 and 2002. There was no delimitation after the 1981 and 1991 Censuses.

Why was there no delimitation then?

- The Constitution mandates that the number of Lok Sabha seats allotted to a state would be such that the ratio between that number and the population of the state is, as far as practicable, the same for all states.
- Although unintended, this provision implied that states that took little interest in population control could end up with a greater number of seats in Parliament.
- The southern states that promoted family planning faced the possibility of having their seats reduced. To allay these fears, the Constitution was amended during Indira Gandhi's Emergency rule in 1976 to suspend delimitation until 2001.
- Despite the embargo, there were a few occasions that called for readjustment in the number of Parliament and Assembly seats allocated to a state. These include statehood attained by Arunachal Pradesh and Mizoram in 1986, the creation of a Legislative Assembly for the National Capital Territory of Delhi, and creation of new states such as Uttarakhand.
- Although the freeze on the number of seats in Lok Sabha and Assemblies should have been lifted after the 2001 Census, another amendment postponed this until 2026.
- This was justified on the ground that a uniform population growth rate would be achieved throughout the country by 2026.
- So, the last delimitation exercise — started in July 2002 and completed on May 31, 2008 — was based on the 2001 Census and only readjusted boundaries of existing Lok Sabha and Assembly seats and reworked the number of reserved seats.

Why is delimitation for Jammu and Kashmir in the news now?

- Delimitation of Jammu and Kashmir's Lok Sabha seats is governed by the Indian Constitution, but delimitation of its Assembly seats (until special status was abrogated recently) was governed separately by the Jammu and Kashmir Constitution and Jammu and Kashmir Representation of the People Act, 1957.
- As far as delimitation of Lok Sabha seats is concerned, the last Delimitation Commission of 2002 was not entrusted with this task. Hence, J&K parliamentary seats remain as delimited on the basis of the 1971 Census.
- As for Assembly seats, although the delimitation provisions of the J&K Constitution and the J&K Representation of the People Act, 1957, are similar to those of the Indian Constitution and Delimitation Acts, they mandate a separate Delimitation Commission for J&K.
- In actual practice, the same central Delimitation Commission set up for other states was adopted by J&K in 1963 and 1973.
- While the amendment of 1976 to the Indian Constitution suspended delimitation in the rest of the country till 2001, no corresponding amendment was made to the J&K Constitution.
- Hence, unlike the rest of the country, the Assembly seats of J&K were delimited based on the 1981 Census, which formed the basis of the state elections in 1996.
- There was no census in the state in 1991 and no Delimitation Commission was set up by the state government after the 2001 Census as the J&K Assembly passed a law putting a freeze on fresh delimitation until 2026. This freeze was upheld by the Supreme Court.

- The J&K Assembly has 87 seats — 46 in Kashmir, 37 in Jammu and 4 in Ladakh. Twenty-four seats are reserved for Pakistan-occupied Kashmir (PoK). The freeze, some political parties argue, has created inequity for Jammu region.

Conclusion:

This month, the Union government scrapped the state's special status and turned J&K into a Union Territory. Under this law, delimitation of Lok Sabha and Assembly seats in J&K UT will be as per the provisions of the Indian Constitution. The Act also states that in the next delimitation exercise, which is expected to kick start soon, the number of Assembly seats will increase from 107 to 114. The increase in seats is expected to benefit Jammu region.

Connecting the dots:

1. Discuss the problems with Delimitation? suggest the measures to over the problems?

[How an Indian citizen is defined](#)

Context:

- In the run-up to the publication of the final National Register of Citizens (NRC) in Assam, citizenship has become the most talked about topic in the country.

Concerns:

- The Assam government has been taking various steps in relation to those who will be left out of the NRC, while the Supreme Court last week rejected a plea to include those born in India between after March 24, 1971 and before July 1, 1987 unless they had ancestral links to India. In any other Indian state, they would have been citizens by birth, but the law is different for Assam

How is citizenship determined?

- Citizenship signifies the relationship between individual and state. It begins and ends with state and law, and is thus about the state, not people. Citizenship is an idea of exclusion as it excludes non-citizens.
- There are two well-known principles for grant of citizenship. While jus soli confers citizenship on the basis of place of birth, jus sanguinis gives recognition to blood ties. From the time of the Motilal Nehru Committee (1928), the Indian leadership was in favour of the enlightened concept of jus soli. The racial idea of jus sanguis was rejected by the Constituent Assembly as it was against the Indian ethos.
- Citizenship is in the Union List under the Constitution and thus under the exclusive jurisdiction of Parliament.
- The Constitution does not define the term 'citizen' but gives, in Articles 5 to 11, details of various categories of persons who are entitled to citizenship.

- Unlike other provisions of the Constitution, which came into being on January 26, 1950, these articles were enforced on November 26, 1949 itself, when the Constitution was adopted. However, Article 11 itself confers wide powers on Parliament by laying down that “nothing in the foregoing provisions shall derogate from the power of Parliament to make any provision with respect to the acquisition and termination of citizenship and all matters relating to citizenship”. Thus Parliament can go against the citizenship provisions of the Constitution.
- The Citizenship Act, 1955 was passed and has been amended four times — in 1986, 2003, 2005, and 2015. The Act empowers the government to determine the citizenship of persons in whose case it is in doubt.
- However, over the decades, Parliament has narrowed down the wider and universal principles of citizenship based on the fact of birth. Moreover, the Foreigners Act places a heavy burden on the individual to prove that he is not a foreigner.

So who is, or is not, a citizen of India?

- **Article 5:** It provided for citizenship on commencement of the Constitution. All those domiciled and born in India were given citizenship. Even those who were domiciled but not born in India, but either of whose parents was born in India, were considered citizens. Anyone who had been an ordinary resident for more than five years, too, was entitled to apply for citizenship.
- **Article 6:** Since Independence was preceded by Partition and migration, Article 6 laid down that anyone who migrated to India before July 19, 1949, would automatically become an Indian citizen if either of his parents or grandparents was born in India. But those who entered India after this date needed to register themselves.
- **Article 7:** Even those who had migrated to Pakistan after March 1, 1947 but subsequently returned on resettlement permits were included within the citizenship net. The law was more sympathetic to those who migrated from Pakistan and called them refugees than to those who, in a state of confusion, were stranded in Pakistan or went there but decided to return soon.
- **Article 8:** Any Person of Indian Origin residing outside India who, or either of whose parents or grandparents, was born in India could register himself or herself as an Indian citizen with Indian Diplomatic Mission.
- **1986 amendment:** Unlike the constitutional provision and the original Citizenship Act that gave citizenship on the principle of jus soli to everyone born in India, the 1986 amendment to Section 3 was less inclusive as it added the condition that those who were born in India on or after January 26, 1950 but before July 1, 1987, shall be Indian citizen. Those born after July 1, 1987 and before December 4, 2003, in addition to one’s own birth in India, can get citizenship only if either of his parents was an Indian citizen at the time of birth.
- **2003 amendment:** The then NDA government made the above condition more stringent, keeping in view infiltration from Bangladesh. Now the law requires that for those born on or after December 4, 2004, in addition to the fact of their own birth, both parents should be Indian citizens or one parent must be Indian citizen and other should not be an illegal migrant. With these restrictive amendments, India has almost moved towards the narrow principle of jus sanguinis or blood relationship. This lays down that an illegal migrant cannot claim citizenship by naturalisation or registration even if he has been a resident of India for seven years.

- **Citizenship (Amendment) Bill:** The amendment proposes to permit members of six communities — Hindus, Sikhs, Buddhists, Jains, Parsis and Christians from Pakistan, Bangladesh and Afghanistan — to continue to live in India if they entered India before December 14, 2014. It also reduces the requirement for citizenship from 11 years out of the preceding 14 years, to just 6 years. Two notifications also exempted these migrants from the Passport Act and Foreigner Act. A large number of organisations in Assam protested against this Bill as it may grant citizenship to Bangladeshi Hindu illegal migrants.

What is different in Assam?

- The Assam Movement against illegal immigration eventually led to the historic Assam Accord of 1985, signed by Movement leaders and the Rajiv Gandhi government.
- Accordingly, the 1986 amendment to the Citizenship Act created a special category of citizens in relation to Assam.
- The newly inserted Section 6A laid down that all persons of Indian origin who entered Assam before January 1, 1966 and have been ordinary residents will be deemed Indian citizens.
- Those who came after 1 January, 1966 but before March 25, 1971, and have been ordinary residents, will get citizenship at the expiry of 10 years from their detection as foreigner. During this interim period, they will not have the right to vote but can get an Indian passport.
- Identification of foreigners was to be done under the Illegal Migrants (Determination by Tribunal) Act, (IMDT Act), 1983, which was applicable only in Assam while the Foreigners Act, 1946 was applicable in the rest of the country.
- The provisions of the IMDT Act made it difficult to deport illegal immigrants. On the petition of Sarbananda Sonowal (now Chief Minister), the Act was held unconstitutional and struck down by the Supreme Court in 2005. This was eventually replaced with the Foreigners (Tribunals of Assam) Order, 2006, which again was struck down in 2007 in Sonowal II.
- In the IMDT case, the court considered classification based on geographical considerations to be a violation of the right to equality under Article 14. In fact, another such variation was already in place. While the cutoff date for Western Pakistan is July 19, 1949, for Eastern Pakistan the Nehru-Liaquat Pact had pushed it to 1950.

Constitutionality of Section 6A

- A five-judge Bench of the Supreme Court is yet to examine the constitutionality of Section 6A under which the current NRC has been prepared.
- The Bench headed by Justice Madan B Lokur did hold its hearing on April 19, 2017, but it was dissolved on the retirement of Justice P C Pant in August 2017. The Supreme Court, in its order last week, refused to extend restrictive provisions of amendments to Assam in view of a different dispensation for them in Section 6A.
- In Assam Sanmilita Mahasangha (2014) where the constitutionality of the 1986 amendment was challenged (the Mahasangha argues that the cutoff year for Assam should be 1951 instead of 1971), the court referred the matter to the Constitution Bench.
- While Section 6A was inserted in 1986 as a result of the Assam Accord, which has been discussed at length by the court, the court accepted the challenge to its constitutionality in 2014

and referred to the Constitution Bench 13 questions such as whether Section 6A is constitutional and valid though it prescribes a different cutoff date for Assam (1971) from the one prescribed in the Constitution for the rest of the country (1949). But then, this provision was about citizenship on commencement of the Constitution.

Conclusion:

- Assam has borne the brunt of migration in ways that unsettled so many identities and created distributive conflicts.
- The process of completing the National Register of Citizens is on, and either way its results are going to leave large numbers of people disaffected and vulnerable.
- The real challenge for India will begin after the process of identifying immigrants is done. What do we do with people we will have declared stateless? How do we address these concerns without a disproportionate burden falling on Assam

Connecting the dots:

1. Assam has excluded four million people from its National Register of Citizens (NRC). Now, it doesn't know what to do with them. Comment.
2. Modern nations are products of migrations and cultural diffusion and all the richer for it. NRC process doesn't seem alive to this reality. Discuss.
3. Political parties must stop feasting on the complexities of Assam's demography. Examine.

Triple Talaq Act

Part of: GS Prelims and Mains GS- I – Indian Society

In News

- President has given his assent to the Triple Talaq Bill that makes giving instant oral triple talaq a criminal offense with provisions of jail term up to three years.
- The triple talaq law or the **Muslim Women (Protection of Rights On Marriage) Act, 2019**, has come into effect retrospectively from September 19, 2018.
- The law now gives a police officer the power to arrest the offender without requiring a warrant
- However, to check misuse, the police takes cognisance only if the complaint is filed by the aggrieved woman or any of her relation by blood or marriage.
- The Bill also provides for bail by a magistrate but only after hearing the aggrieved woman
- The aggrieved woman is entitled to demand a maintenance for her and her dependent children under the Act

Do you know?

- In August 2017 the Supreme Court, by a majority of 3:2, set aside the practice of triple talaq in **Shyara Bano Case**.

- The judgment held triple talaq to be unconstitutional under Article 14 read with Article 13(1) and concluded that the practice is not essential to the practice of Islam(Article 25)
- The practice of “triple talaq” was abolished in 38 countries including Muslim-majority countries of Saudi Arabia, Morocco, Afghanistan and Pakistan

Consumer Protection Bill

Part of: GS Prelims and Mains GS II- Statutory, regulatory and various quasi-judicial bodies.

In News

- The Consumer Protection Bill 2019, already passed by Lok Sabha, was approved in the Upper House and will replace the Consumer Protection Act, 1986.
- **Aim:** To protect the interests of consumers by establishing authorities for timely and effective administration and settlement of consumers’ dispute.
- **New Bill- Benefit to Consumers**
- Presently Consumer only have a single point of access to justice, which is time consuming. Additional swift executive remedies are proposed in the bill through **Central Consumer Protection Authority (CCPA)**
- CCPA will be empowered to investigate, recall, refund and impose penalties. It will regulate matters related to violation of consumer rights, unfair trade practices, and misleading advertisements.
- **Provision for class action law suit** for ensuring that rights of consumers are not infringed upon
- Deterrent punishment to **check misleading advertisements and adulteration of products**
- **Product liability provision** to deter manufacturers and service providers from delivering defective products or deficient services
- **Ease of approaching** Consumer Commission and Simplification of Adjudication process (Filing from place of residence, E-filing, Videoconferencing for hearing)
- Scope for early disposal of cases through **mediation** (ADR mechanism, Mediation cells to be attached to Consumer Forum)
- Provision for rules for new age consumer issues: **e-commerce & direct selling**

Consumer protection bill 2019

Context

- The Rajya Sabha passed the Consumer Protection Bill, 2019 that provides for the establishment of authorities for the timely and effective administration and settlement of consumer disputes.
- The Bill seeks to replace the three-decade-old Consumer Protection Act, 1986.

Back ground:

- The CPA, 1986 was enacted considering the large number of consumers in India who are illiterate and are susceptible to exploitation by unscrupulous businesses. Hence, a major objective of this Act was to make consumers aware of the various quality-control measures (e.g.

Hallmark, BIS-mark etc.) being employed for the products and the rights available to them to seek Redressal against unfair practices.

- Although, the impacts have been largely positive as is visible in the increased consumer awareness and adherence of businesses to the quality-control standards, there have been certain issues as well. The movement has left many rural regions untouched. Also, the slow progress of addressing the cases has resulted in large-scale pendency.

Key features of the Bill include:

Definition of consumer:

- A consumer is defined as a person who buys any good or avails a service for a consideration. It does not include a person who obtains a good for resale or a good or service for commercial purpose. It covers transactions through all modes including offline, and online through electronic means, teleshopping, multi-level marketing or direct selling.

Rights of consumers:

Six consumer rights have been defined in the Bill, including the right to:

- be protected against marketing of goods and services which are hazardous to life and property;
- be informed of the quality, quantity, potency, purity, standard and price of goods or services;
- be assured of access to a variety of goods or services at competitive prices; and
- seek redressal against unfair or restrictive trade practices.

Central Consumer Protection Authority:

- The central government will set up a Central Consumer Protection Authority (CCPA) to promote, protect and enforce the rights of consumers.
- It will regulate matters related to violation of consumer rights, unfair trade practices, and misleading advertisements.
- The CCPA will have an investigation wing, headed by a Director-General, which may conduct inquiry or investigation into such violations.
- CCPA will carry out the following functions, including:
 - Inquiring into violations of consumer rights, investigating and launching prosecution at the appropriate forum;
 - Passing orders to recall goods or withdraw services that are hazardous, reimbursement of the price paid, and discontinuation of the unfair trade practices, as defined in the Bill;
 - Issuing directions to the concerned trader/ manufacturer/ endorser/ advertiser/ publisher to either discontinue a false or misleading advertisement, or modify it;
 - Imposing penalties, and;
 - Issuing safety notices to consumers against unsafe goods and services.

Penalties for misleading advertisement:

- The CCPA may impose a penalty on a manufacturer or an endorser of up to Rs 10 lakh and imprisonment for up to two years for a false or misleading advertisement. In case of a subsequent offence, the fine may extend to Rs 50 lakh and imprisonment of up to five years.

- CCPA can also prohibit the endorser of a misleading advertisement from endorsing that particular product or service for a period of up to one year.
- For every subsequent offence, the period of prohibition may extend to three years. However, there are certain exceptions when an endorser will not be held liable for such a penalty.

Consumer Disputes Redressal Commission:

- Consumer Disputes Redressal Commissions (CDRCs) will be set up at the district, state, and national levels.
- A consumer can file a complaint with CDRCs in relation to:
 - Unfair or restrictive trade practices;
 - Defective goods or services;
 - Overcharging or deceptive charging; and
 - The offering of goods or services for sale which may be hazardous to life and safety.
- Complaints against an unfair contract can be filed with only the State and National Appeals from a District CDRC will be heard by the State CDRC. Appeals from the State CDRC will be heard by the National CDRC. Final appeal will lie before the Supreme Court.

Jurisdiction of CDRCs:

- The District CDRC will entertain complaints where value of goods and services does not exceed Rs one crore. The State CDRC will entertain complaints when the value is more than Rs one crore but does not exceed Rs 10 crore. Complaints with value of goods and services over Rs 10 crore will be entertained by the National CDRC.

Product liability:

- Product liability means the liability of a product manufacturer, service provider or seller to compensate a consumer for any harm or injury caused by a defective good or deficient service. To claim compensation, a consumer has to prove any one of the conditions for defect or deficiency, as given in the Bill.

New Bill- Benefit to Consumers

- Presently Consumer only have a single point of access to justice, which is time consuming. Additional swift executive remedies are proposed in the bill through Central Consumer Protection Authority (CCPA)
- Deterrent punishment to check misleading advertisements and adulteration of products
- Product liability provision to deter manufacturers and service providers from delivering defective products or deficient services
- Ease of approaching Consumer Commission and Simplification of Adjudication process
- Scope for early disposal of cases through mediation
- Provision for rules for new age consumer issues: e-commerce & direct selling

Conclusion:

- However, certain issues such as the appointment of mediators to settle disputes are contentious as this would lead to arm-twisting of the weaker parties and may encourage corruption. Also, the setting up of a Consumer Authority and absence of provisions to streamline the conducting of cases in courts may only lead to greater regulations and complexities. Addressing these issues

is necessary to ensure that the new amendments bring about definitive improvements in the CPA.

Connecting the dots:

- Discuss the salient features of consumer protection bill 2019?

[Prevention of money laundering act \(PMLA\)](#)

Part of: GS Prelims and Mains GS II – Public administration

In News

- The Centre has issued a notification on certain changes in PMLA
- An explanation added to Section 45 clarifies that all PMLA offences will be **cognisable and non-bailable**.
- Therefore, the Enforcement Directorate (ED) officers are empowered to arrest an accused without warrant, subject to certain conditions.
- New change **does away with the pre-requisite of an FIR or chargesheet by other agencies** that are authorised to probe the offences listed in the PMLA schedule.
- Now, under Section 44, **the Special Court, while dealing with the offence under this Act shall not be dependent upon any orders** passed in respect of the scheduled offence, and the trial of both sets of offences by the same court shall not be construed as joint trial.
- **The scope of “proceeds of crime”, under Section 2, has been expanded** to empower the agency to act against even those properties which “may directly or indirectly be derived or obtained as a result of any criminal activity relatable to the scheduled offence”.

[Competition Law Review](#)

Part of: GS Prelims and Mains GS II - Governance

In News

- The Government constituted a **Competition Law Review Committee** on 1st October, 2018 to review the existing Competition law framework and make recommendations to further strengthen the framework to inter alia meet new economy challenges.
- The Committee was chaired by **Shri Injeti Srinivas**
- The committee has submitted its report and some of its key recommendation are:
- Introduction of a **‘Green Channel’** for combination notifications to enable fast-paced regulatory approvals for majority of mergers and acquisitions having not much adverse effects on competition.
- Introducing a **dedicated bench in NCLAT** for hearing appeals under the Competition Act

- Introduction of express provisions to identify '**hub and spoke**' agreements as well as agreements that do not fit within typical horizontal or vertical anti-competitive structures to cover agreements related to business structures and models synonymous with new age markets.
- CCI to issue **guidelines on imposition of penalty** to ensure more transparency and faster decision making which will encourage compliance by businesses.
- **Strengthening the governance structure of CCI** with the introduction of a Governing Board to oversee advocacy and quasi-legislative functions, leaving adjudicatory functions to the Whole-time Members.
- **Merging DG's Office with CCI** as an 'Investigation Division' as it aids CCI in discharging an inquisitorial rather than adversarial mandate. However, functional autonomy must be protected.
- **Opening of CCI offices at regional level** to carry out non-adjudicatory functions such as research, advocacy etc. and interaction with State Governments and State regulators.

Do You know?

- **Competition Act, 2002** provided for the establishment of a Commission to prevent practices having adverse effect on competition, to promote and sustain competition in markets, to protect the interests of consumers and to ensure freedom of trade carried on by other participants in markets, in India.
- The 2002 act replaces "The Monopolies and Restrictive Trade Practices Act, 1969"

[Aadhaar-social media profile linking](#)

Part of: GS Mains II - Important aspects of governance, transparency and accountability

In News

- There is growing demand to link social media profiles of users with their Aadhaar numbers to check circulation of fake, defamatory and pornographic content, as well as material that is anti-national or related to terror activities.
- As a result, petitions - to link aadhar & user profile - have been filed against Social media platforms (like Facebook) in different High Courts of India
- Facebook has in turn filed a plea in Supreme Court, to transfer all such petitions pending before different high courts to Supreme Court for adjudication.
- Facebook contended that there were four petitions - two in the Madras High Court and one each in the Bombay and the Madhya Pradesh High Courts - on the issue.
- There was a risk that the different High Courts may arrive at conflicting decisions on the issue of Aadhaar linkage. It would be better to have the SC take the final call.
- The Supreme Court stressed the need to find a **balance** between the **right to online privacy** and the **right of the State to detect people** who use the web to spread panic and commit crimes.
- Governments response on the issue is crucial given that **SC has upheld the right to privacy as a fundamental right in 2017**

Legislative Councils

Part of: GS Prelims and GS Mains II – Indian Federalism

In News

- The Madhya Pradesh government has indicated that it plans to initiate steps towards creation of a Legislative Council.
- Currently, only six states have Legislative Councils
- Under **Article 169**, Union Parliament has the power to create or abolish the Legislative Council **on the basis of resolutions adopted by special majority** in the Assembly of the concerned State.
- Under **Article 171** of the Constitution, the Legislative Council of a state shall not have more than one-third of the number of MLAs of the state, and not less than 40 members.
- Like Rajya Sabha, it is a permanent House and its members are elected indirectly by people
- **Favour of Second House:** It can help check hasty actions by the directly elected House, and also enable non-elected individuals to contribute to the legislative process
- **Against Second House:** A Legislative Council can be used to delay legislation, and to park leaders who have not been able to win an election.

Do You Know?

- Unlike Rajya Sabha which has substantial powers to shape non-financial legislation, Legislative Councils lack a constitutional mandate to do so; Assemblies can override suggestions/amendments made to a legislation by the Council
- Andhra Pradesh's Legislative Council, set up in 1958, was abolished in 1985, then reconstituted in 2007.
- The Odisha Assembly recently passed a resolution for a Legislative Council.
- Proposals to create Councils in Rajasthan and Assam are pending in Parliament.

STATES WITH TWO HOUSES

| State | MLA seats* | MLC seats |
|-------------|------------|-----------|
| Andhra | 176 | 58 |
| Bihar | 243 | 58 |
| Karnataka | 225 | 75 |
| Maharashtra | 289 | 78 |
| Telangana | 119 | 40 |
| UP | 404 | 100 |

* Including nominated members

<https://images.indianexpress.com/2019/08/1-13.jpg>

SOCIAL ISSUE/WELFARE

The taproot of conservation justice

Context

- Cutting down the Forests Right Act will only weaken the conservation regime and affect the rights of forest dwellers

What is Forest rights Act?

- The Forest Rights Act (FRA) is a piece of social legislation which aims to address the historical injustice that our forest dwelling communities have had to face for nearly 150 years by providing them with security of tenure over land for cultivation and habitation through individual right
- It also provides access to a variety of resources through more than a dozen types of community forest rights.
- The FRA also empowers forest dwelling communities to protect, regenerate, conserve and manage any community forest resource which they have been traditionally protecting and conserving for sustainable use.
- It has the provision for creating critical wildlife habitats within protected areas which currently is the strongest conservation provision among existing laws of the country.

Background of Forest Rights Act

- In the colonial era, the British diverted abundant forest wealth of the nation to meet their economic needs. While procedure for settlement of rights was provided under statutes such as the Indian Forest Act, 1927, these were hardly followed.
- As a result, tribal and forest-dwelling communities, who had been living within the forests in harmony with the environment and the ecosystem, continued to live inside the forests in tenurial insecurity, a situation which continued even after independence as they were marginalised.
- The symbiotic relationship between forests and forest-dwelling communities found recognition in the National Forest Policy, 1988.
- The policy called for the need to associate tribal people in the protection, regeneration and development of forests.
- The Scheduled Tribes and Other Traditional Forest Dwellers (Recognition of Forest Rights) Act, 2006, was enacted to protect the marginalised socio-economic class of citizens and balance the right to environment with their right to life and livelihood.

Related Acts and Provisions:

Wildlife protection Act 1972

- This act prohibits the capturing, killing, poisoning or trapping of wild animals.
- It extends to the whole of India except the State of Jammu and Kashmir

- It also regulates and controls trade in parts and products derived from wildlife.

1988 National Forest Policy

- The policy aims at maintaining of environmental stability.
- It looks at conserving the natural heritage of the country by preserving the remaining natural forests.
- Increasing forest/tree cover in the country through massive afforestation and social forestry programmes.
- Creating a massive people's movement for achieving these objectives and to minimise pressure on existing forests.

The Provisions of the Panchayats (Extension to the Schedule Areas) Act 1996 (PESA)

- It safeguards and preserves the traditions and customs of the people, and their cultural identity, community resources, customary mode of dispute resolution.
- PESA empowers Gram Sabha/Panchayat at appropriate level with right to mandatory consultation in land acquisition, resettlement and rehabilitation of displaced persons.
- PESA seeks to reduce alienation in tribal areas as they will have better control over the utilisation of public resources.
- It will help minimise exploitation of tribal population as they will be able to control and manage money lending, consumption and sale of liquor and also village markets.
- PESA looks to promote cultural heritage through preservation of traditions, customs and cultural identity of tribal population.

What does the Forest Rights Act provide for?

- The Scheduled Tribes and Other Traditional Forest Dwellers (Recognition of Forest Rights) Act or FRA was passed by the Parliament in 2006 and came into effect in 2008.
- It was intended to correct the "historical injustice" done to forest dwellers from the colonial times.
- [The traditional rights of such communities were derecognised by the British Raj in the 1850s.]
- The Act recognises and vests the forest rights and occupation in forest land in the forest dwelling Scheduled Tribes.
- It also covers other traditional forest dwellers who have been residing in such forests for generations but whose rights could not be recorded.
- The Act recognises -
 - individual rights to forest land and livelihood
 - community rights to forest 'land' exercised by their gram sabha
 - community forest 'resource' rights, giving gram sabhas the power to protect and manage their forest
- Conservation plans and developmental projects in these areas would have to be approved by gram sabhas.

Rights under the act

There are different rights recognised under the act which can be summarised as following

- **Title rights-** i.e. right to ownership to land farmed by tribals or forest dwellers subject to a maximum of 4 hectares, ownership is only for land that is actually being cultivated by the concerned family and no new lands will be granted.
- **Use rights-** to minor forest produce (also including ownership), to grazing areas, to pastoralist routes, etc.
- **Relief and development rights-** to rehabilitation in case of illegal eviction or forced displacement and to basic amenities, subject to restrictions for forest protection
- **Forest management rights-** to protect and conserve forests and wildlife

Legal challenges

- It is extremely unfortunate that the very constitutionality of the FRA was challenged in the Supreme Court in 2008 by about half a dozen conservation organisations.
- The court has tagged many other cases including from several High Courts which are currently being heard jointly.
- The court's order of February 13, 2019 since put in abeyance by its order dated February 28, 2019 highlights the very tardy implementation of the FRA by the State governments.
- One of the key arguments of the petitioners has been that it is beyond the legislative competence of Parliament to enact the FRA as 'land' is a state subject.
- Tenuous as this is, if this argument of the petitioners is accepted, the Wildlife Protection Act and the entire architecture of forest laws will have to be dismantled as ultra vires as all of them deal with 'land', including the Indian Forest Act and the Forest (Conservation) Act.

Criticism of FRA

- The FRA has been savagely criticised as a land distribution legislation, which it is not.
- The FRA very clearly states that forest dwellers who are either Scheduled Tribes or Other Traditional Forest Dwellers are only entitled to claim both individual and community forest rights through a clear process of submitting a claim and after its verification and subsequent approval or rejection.
- For the rejected cases, an appeal process has been outlined.
- The FRA aims to only confirm tenure and access rights which in some sense the forest dwellers have been exercising de facto but under severe restrictions and control especially by the forest department.
- In fact, it is the failure of the state to settle pre-existing rights under existing forest and conservation laws that created the situation of historical injustice.
- The FRA does not sanction any fresh clearance of forest, as individual rights over land will only be granted if the forest dweller was in possession of that parcel of land on December 13, 2005.
- It also limits the extent of land that can be granted to the area that was occupied on December 13, 2005 and places an upper limit of four hectares per claimant for individual rights.
- These provisions are often overlooked or deliberately suppressed by those who criticise FRA.

Conclusion:

- The FRA, by design, has tremendous potential to strengthen the conservation regime across India by recognising rights of forest dwellers over land and community forest resources, a key factor for conservation to succeed as shown both by research and practice in many countries.
- By democratising forest governance and conservation through the provision of rights and authority to local communities and gram sabhas for conservation and management of forests, the FRA will empower gram sabhas of the forest dwelling communities to halt the destruction of forests, as especially highlighted in the Niyamgiri case.
- Implementing the FRA in letter and spirit with empathy for forest dwellers will be a decisive step by India to achieve conservation justice.

Connecting the dots:

- What is the genesis of Forest Rights Act? Critically analyse the successful implementation of the act with respect to tribal rights.

Census 2021

Part of: GS Prelims and Mains GS II - Issues relating to development and management of Human resources.

In News

- Census 2021 is unlikely to collect “caste wise” data as a similar exercise conducted in 2011 threw up about 40 lakh caste names that were difficult to tabulate
- Census 2021 exercise will be done in three phases
 - House Listing phase: comprising 34 categories, It will be done from April to September 2020
 - Enumeration phase: Comprising 28 categories will be held between Feb 9 and 28, 2021
 - Revision: It will be done from March 1 to 5, 2021
- Government teachers will conduct the exercise (nearly 3 million enumerators)
- There will be a third gender category this time
- Data will be conducted on web based application developed under the Registrar General
- Every citizen is compelled by law to participate in the exercise and denial could lead to criminal action

Do You know?

- The responsibility of conducting the decennial Census rests with the Office of the Registrar General and Census Commissioner, India under **Ministry of Home Affairs**
- The results of Census 2011 took nearly nine years to be published. The digitisation of process will ensure that most parameters of 2021 census will be available by 2024-25
- The 2011 caste data, collected as part of the Socio Economic Caste Census (SECC), is yet to be released by the Centre

- The SECC, 2011 was conducted through a comprehensive programme involving the Ministry of Rural Development, Ministry of Housing and Urban Poverty Alleviation, The Office of the Registrar General and Census Commissioner, India and the State Governments.

Sex-ratio at birth

Part of: GS Prelims and Mains GS I - Society

In News

- The sex ratio at birth (SRB) in the country, defined as the number of female births per 1,000 male births
- SRB improved from 914 to **919** between the third and fourth National Family Health Surveys (NFHS), carried out in 2005-06 and **2015-16** respectively
- The highest improvement was in Punjab at 126 points to reach SRB of 860
- Second highest improvement in SRB was in Kerala, by 122 points from 925 in 2005-06 to 1,047 in 2015-16 (the highest SRB among all states)
- The sharpest decline was in Sikkim, where the SRB dropped 175 points to reach 809, (the lowest SRB among all states)
- SRB has been falling in states like Uttar Pradesh, Uttarakhand, Madhya Pradesh and Assam
- Projects such as Beti Bachao Beti Padhao, Pre-Conception and Pre-Natal Diagnostic Techniques (PC-PNDT) Act, Medical Termination of Pregnancy (MTP) Act, Protection of Children from Sexual Offences (POCSO) Act

2015-16: TOP 6 & BOTTOM 6

| | |
|----------------------|-------|
| Kerala | 1,047 |
| Dadra & Nagar Haveli | 1,013 |
| Meghalaya | 1009 |
| Chhattisgarh | 977 |
| Tripura | 966 |
| Goa | 966 |
| Punjab | 860 |
| A&N Islands | 859 |
| Puducherry | 843 |
| Haryana | 836 |
| Delhi | 817 |
| Sikkim | 809 |

Source: NFHS-4 via Ministry of Health

Pic: <https://images.indianexpress.com/2019/08/sds.jpg>

[Fertility rate](#)

Part of: GS Prelims and Mains GS I – Social Issues

In News

- During his Independence Day speech, Prime Minister Narendra Modi underlined challenges posed by population growth in the country
- **Total Fertility Rate (TFR)**, defined as the number of children born to a woman until the end of her child-bearing age
- For four successive years (2013-2016) the TFR had stagnated at 2.3.
- The latest data estimates (2017) show the TFR dropping to 2.2. This figure is only marginally higher than the **fertility rate (2.1) required for replacement of the existing population**.
- TFR is calculated from data of the **Sample Registration System (SRS)** undertaken by the Office of the Registrar General of India.
- Even the states that have a higher TFR — Uttar Pradesh (3.0), Bihar (3.2), MP (2.7), Rajasthan (2.6), Assam (2.3), Chhattisgarh (2.4) and Jharkhand (2.5) — have been witnessing a declining trend in fertility rates.
- Two more states, Gujarat and Haryana, recorded a **TFR of 2.2**, which is above the replacement rate but is **equal to the national average**. Taken together, these nine major states account for 52 per cent of the 2011 population.
- This means that in the states barring these nine, and accounting for almost half the population, the replacement level is either 2.1 or has gone below it.
- States with a lower TFR include Kerala (1.7), Tamil Nadu (1.6), Karnataka (1.7), Maharashtra (1.7), Andhra Pradesh (1.6), Telangana (1.7), West Bengal (1.6), Jammu and Kashmir (1.6) and Odisha (1.9).

Do You Know?

- The SRS also looks at other indicators such as crude birth rate, general fertility rate, age specific/marital fertility rate, gross reproduction rate along with sex ratio at birth.
- While Census figures provide the total population every decade, the regular SRS estimates provide dynamic trends underlying the population growth.

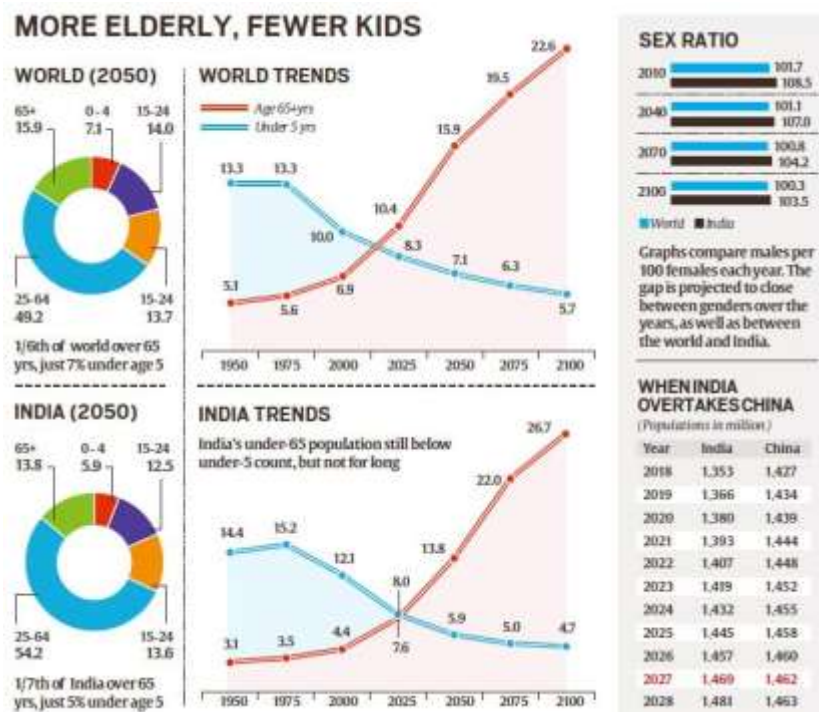
[UN Population report](#)

Part of: GS Prelims and GS Mains I - Society

In News

- **The World Population Prospects 2019** which gives global population estimates and projections was released by **United Nations**

- The world's population is expected to increase from 7.7 billion currently to **9.7 billion in 2050** and the overall growth rate will continue to fall.
- The countries expected to show the biggest increase in population are **India, Nigeria and Pakistan**
- Also, **fertility rates are falling** worldwide from 3.2 in 1990 to 2.5 in 2019, and is projected to fall further to **2.2 births by 2050**.
- In 2018, for the first time, **persons aged 65 years** or over worldwide outnumbered children under age five.
- By 2050, the number of persons aged 65 or over will also surpass the number of adolescents and youth aged 15-24.
- **Life Expectancy (LE):** Although overall LE will increase (from 64.2 years in 1990 to 77.1 years in 2050), LE in poorer countries is projected to continue to lag behind.
- **Sex ratio:** Males are projected to continue to outnumber females until the end of the century, but the gap will close



<https://images.indianexpress.com/2019/06/one.jpg>

Do You know?

- **Early marriage, absence of reproductive and sexual rights** has a major and negative repercussions on Indian women's education, income, safety and their overall empowerment.
- India's **Maternal mortality ratio** in 2015 was 174 deaths per lakh live births (down from 448 in 1994) while the global MMR in 2015 was 216.
- While 28 of every 1,000 Indian adolescent women (**age 15-19**) gave birth between 2006 and 2017, the global **adolescent birth rate** was at 44 per 1,000.
- **India's fertility rate** in 2019 is 2.3 births per woman, compared to 2.5 worldwide

Reservations in Chhattisgarh

Part of: GS Mains II – Social issues

- **Chhattisgarh** government announced an increase in reservations for OBCs and Scheduled Castes in state government jobs and education
- It will increase the quota for SCs by 1 % while nearly doubling reservation for OBCs from 14 % to 27 %. The quota for STs remains at 32 %.
- Once in effect, Chhattisgarh will have a total of 72 % reservation (32 % for STs, 13 % for SCs and 27 % to OBCs), the highest in the country and far above the 50 % cap on quotas mandated by the Supreme Court
- The state government is still considering the 10 % centre mandated EWS quota for the general category. if implemented, it would take the reservation to 82 %.
- According to government, this has been done to keep it in line with the population demographic in the state. The percentage of OBCs is close to 47 %, who along with STs form the major chunk of the population.

Urbanise India to eliminate poverty

CONTEXT:

- Sustainable urbanisation can mobilise India's potential. The world is at 55.3% urbanisation on average, whereas India lags at 34%.
- India must systematically urbanise and provide mass-employment to its large population in high-growth sectors like industry and services.

Can we grow enough food with a reduced agriculture workforce?

- World Bank data shows that with only 1.3% of its workforce in farms, the US produces enough food to feed double its population.
- In 2017, median farming household income was \$75,994, which exceeded the \$61,372 US household median.
- China, with 27% of its workforce involved in farming, produces 500 million tonnes of food every year with less arable land than India.
- India, in comparison, produces 290 million tonnes of food with a 43% agriculture workforce when 20% would suffice.
- With higher yield and productivity, a smaller agriculture workforce will earn comparably with industry and services.

The case for urbanisation is evident when we examine state-wise data.

- The accompanying graphic shows urban percentage, per-capita GSDP, higher education **Gross Enrolment Ratio (GER)**, and **Total Fertility Rate (TFR)** for representative states.
- GER is an indicator of human capital development; crucial for high-growth sectors like services.

- TFR indicates whether a population is shrinking or expanding and is vital to policy planning,

States in the South-West zones:

- These states are more urbanised.
- All above the 31% all-India average. These states also have low TFR, considerably below the national average of 2.18.
- Low fertility and high GER has resulted in better educated, smaller populations that are earning more than their northern counterparts.

Tamil Nadu (TN):

- It has India's highest GER, at 48.6, and one of the lowest TFRs, at 1.7. In 2011 itself, we can see TN is most urbanised at 48.4%, with an already-high GER of 40. No other big Indian state attained a GER of 40 even in 2017-18.
- Rapid urbanisation has boosted TN's enrolment in higher education. However, regressive focus on caste politics has taken away from growth.
- Though TN had the second-highest per-capita GSDP in 2011-12, growth is lower compared to states like Karnataka and Telangana, which are driven by services.
- The TN government must converge on using high GER and urbanisation to drive its strong industry legacy and build a large services sector.

Karnataka:

- Karnataka is an intriguing case. With one of the highest per-capita GDPs at Rs 2 lakh in 2017-18 and a reasonably high urban percentage at 38%, a reality check indicator is its lower GER of 27.8.
- Data from RBI and the Economic Survey show 60% of Karnataka's GDP comes from Bengaluru and the services sector—driven by IT and other technological drivers.
- Like most southern states, TFR is low; but, the state sees significant immigration. Despite its large services sector, by defocusing on human capital
- Karnataka's government is placing natives in an unfortunate situation of being unable to compete for the best jobs in their state.
- Karnataka must focus on urbanisation and development of human capital to remedy this, which will further boost the state's impressive growth trajectory.

Gujarat:

- Gujarat is another unusual case—high urbanisation at 43% but lower-than-average GER of 20.1. Gujarat's steady growth and high per-capita GSDP of Rs 2 lakh are driven by its phenomenal industry sector, which accounts for more than half of GVA.
- High dependency on industry, and not services, which contribute only 35% of GVA, means Gujarat's growth will start slowing down when automation and other factors kick in.
- With a TFR of 2.03, Gujarat's population downturn is not as steep as southern states. Without the development of human capital, Gujarat is in danger of lagging in the future.
- The answer to this is investing in higher education and building a strong services sector to complement its industry.

Northern states

Punjab:

- Punjab stands out among northern states. It boasts a high urban percentage (37.5%), high GER (30.3) in 2017-18, and one of the lowest TFRs (1.62).
- Despite this, Punjab still relies heavily on agriculture; its services and industrial output is lower than that of southern states.
- With indicators of high urbanisation, high GER and low population growth, Punjab can easily make the transition to a high-growth economy focused on services, with the right policies.

North-Central-East zones

- Other states in the North-Central-East zones mostly have low urbanisation and low GER. The lack of urbanisation has resulted in a shortage of industry and services sectors and low per-capita GDP.
- The populations in these states will keep growing in the foreseeable future, indicated by higher TFRs.
- Without employment options in high-growth sectors, these large populations cannot rely on agriculture or industry alone for growth. Services are a must. Uttar Pradesh has made a valiant effort to develop human capital—GER rose from 17.4 to 25.9 in six years.
- Now, policies to boost output with labour-intensive industries (LIIs) and services to provide formal employment can increase growth.

Bihar :

- Bihar is a troubling case study on the effects of low urbanisation and human capital. Only 11.3% of the population is urban. GER is the lowest in India and hardly growing—from 12.5 to 13 in six years.
- Per-capita GSDP is lowest, at `42,000 in 2017-18. Despite having fertile land, Bihar's agriculture sector cannot grow because it is disorganised with a large number of dependents.
- With India's highest TFR—3.41—Bihar's expanding population is condemned to a sub-aspirational existence due to the state's stagnant economy.
- Bihar needs special attention from the Centre, with focused schemes to organise the agricultural industry, urbanise and educate the masses, and provide mass employment through LIIs.
- Madhya Pradesh has set a good example here by prioritising agrarian growth as well as instituting LIIs to provide mass employment

Conclusion:

- It is clear that every state—irrespective of prosperity or geographical location—is diverse. We are now in an era where the role of the Centre is increasingly limited, and state spending is growing. Each state must evaluate its economy—workforce distribution, sectoral contribution, demographics, formal employment, higher education and specialisation, unique growth drivers—and set a development plan.

Connecting the dots:

1. For India to make urbanisation sustainable, it must first tackle the problems of multiplicity of jurisdictions, weak revenue base and human resource capacity deficit that impact most of its cities. Analyse.
2. How to harness the benefits of Urbanisation for more economic development. Discuss

The 'Kerala Model' is unsustainable

Context:

- Over the years, parties have responded to commercial interests over the welfare of people

Concerns:

- In 2018 Kerala was overwhelmed by an unprecedented natural event. Flooding combined with landslides caused many deaths. Floods were not new to Kerala, which receives high rainfall. What was new compared to the times of equally high rainfall in the early part of the last century was the flooding due to inept dam management and the vulnerability of the terrain induced by the pattern of land use.
- In 2019 we have seen some of this repeated. This year it is the landslides that have caused most deaths. They are a relatively recent phenomenon, pointing to the role of uncontrolled economic expansion.

Kerala Model of Development:

The positive side, -Kerala has

- Comparatively low levels of basic gender inequality (reflected, for instance, in a high female-male ratio),
- Relatively equitable educational opportunities (indeed, near-universal literacy, especially among the young),
- Extensive social security arrangements (e.g. broad-based entitlements to homestead land, old-age pensions and the 'public distribution system
- Limited incidence of caste oppression (e.g. few violent crimes against scheduled castes),
- Low rural-urban disparities.
- The role of basic education (and, particularly of female literacy) in promoting basic capabilities
- The favourable position and informed agency of women crucial to a wide range of social achievements;
- The access to public utilities;
- The role of public action in a wide sense, involving the State and the public at large.
- Lauded for the high human development indicators it is believed to have bestowed upon the State

Failures:

- The foremost is the inability to meet the employment aspirations of the people, pushing them to live under authoritarian regimes overseas.
- Second, the laudable public provision of health and education has been financed by borrowing.
- Kerala has the highest per capita public debt among States, implying that we are passing on the bill for our own maintenance to future generations.
- Kerala has not done so well when viewed through the lens of gender justice. High levels of female education have not led to an equally high participation of women in the labour force or in governance, even though they participate equally in elections.
- The extraordinary events that we have witnessed this year range from fountains sprouting out of the earth due to the hitherto unknown 'water piping' to constructed structures shifting, physical phenomena not yet widely understood.
- There has been overbuilding in Kerala, with absentee owners having invested in luxury houses they do not always occupy. As a result poorer households are crowded out of safe locations on the plains to precarious ones on the hills.
- Public policy has failed miserably to regulate land use including rampant quarrying, which destabilises the earth's surface, with political patronage. Truth is that public policy is part of the problem
- The floodgates were opened in 2015 when the Congress party did away with environmental clearance for quarries in existence for three years.
- Then in 2017 the Pinarayi Vijayan government relaxed the rules for quarrying further.
- It also weakened the provisions of the legislation governing conversion of agricultural land into construction sites.
- The rice paddies had both produced food and served as gargantuan sinks for rainwater.
- Kerala's principal political parties, irrespective of their ideologies, have responded to commercial interests over the welfare of ordinary people.

Conclusion:

- To come out of this morass the people of Kerala would have to rely on themselves. They need to acknowledge that their consumption pattern must change as it has adversely impacted the natural environment, the consequences of which have begun to hurt them. In this task they are unlikely to be guided by the State's politicians and intellectuals who led them into this cul-de-sac in the first place.

Connecting the Dots:

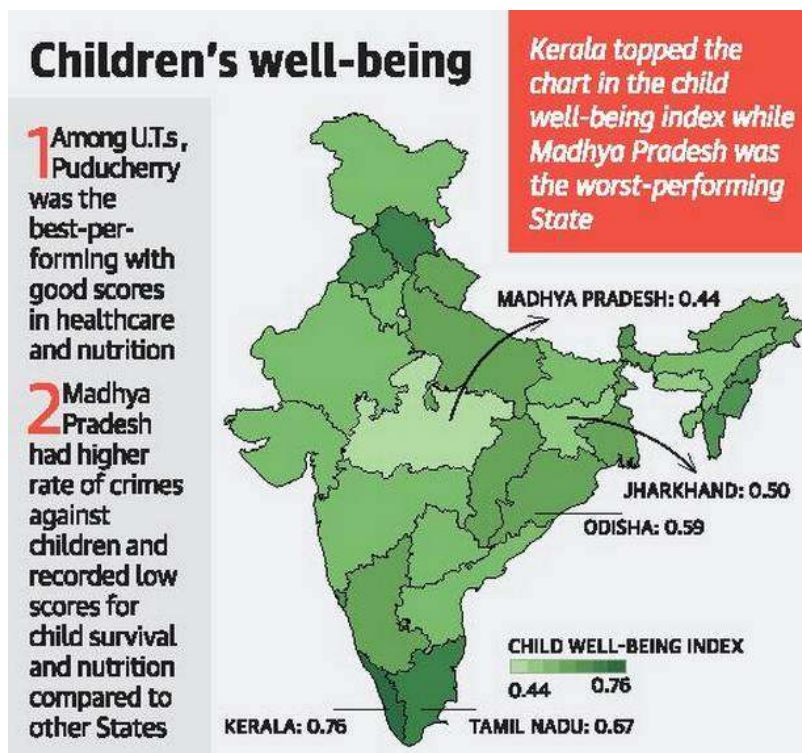
1. Compare the Kerala model of development with Gujarat model?

[Child well-being index](#)

Part of: GS Prelims and GS Mains I –Society

In News

- The index is prepared by **NGO World Vision India** and research institute **IFMR LEAD** to measure and **tracks children's well-being comprehensively**.
- The index contains 24 indicators based on **three key dimensions** of healthy individual development, positive relationships and protective contexts.
- Kerala, Tamil Nadu, Himachal Pradesh and Puducherry topped the index rankings whereas Meghalaya, Jharkhand and Madhya Pradesh were at the bottom of rankings
- The report **helps States to prioritise the areas of interventions** with respect to improving the status of children
- Some of the key indicators that need to be studied in the future include mobile usage, **digital access**, financial literacy, **mental health** and quality of relationships per se, between parents/peers and children



https://www.thehindu.com/news/national/other-states/hpxglu/article29272083.ece/alternates/FREE_615/Col-Childrencol

Reconstituting and Reforming the Law Commission of India

In news:

- The government is yet to take a call on reconstituting the Law Commission. The last commission had gone out of office a year. The Law Commission of India — the oldest amongst the national-level bodies — remains an odd one even in its 65th year.

Background:

- **Law Commission of India** is an executive body established by an order of the Government of India. Its major function is to work for legal reform. Its membership primarily comprises legal experts, who are entrusted a mandate by the Government. The Commission is established for a fixed tenure and works as an advisory body to the Ministry of Law and Justice.
- In the eighth year of Independence, the Government of India decided to revive the British legacy of appointing law commissions to study, research and report on legal matters specified in their terms of reference.
- The first commission was set up in 1955.
- Reports of the commission are generally written individually by members including the chairman and placed before the full commission for discussion and adoption.

Issues:

- Unlike its sister organisations, established much later, it has no fixed composition, no defined eligibility criteria for its chair and members, and no set functions — everything rests on the government's will.
- The terms of reference are specified afresh each time it is reconstituted as if it were an ad hoc body. Three of the other national commissions those for the Scheduled Castes, Scheduled Tribes and Backward Classes, are now regulated by the Constitution and there is a parliamentary charter for each of the national commissions for human rights, minorities, women, children and safai karmcharis.
- Though the commission's job requires research-oriented juristic learning, which cannot essentially be the outcome of judicial experience, the commission has been a haven for retired judges.
- Members of the commission are also generally drawn from the judiciary, and the member-secretary is always from the bureaucracy.

Way forward and Conclusion:

- If the commission has to work without regard for extra-legal and political considerations it must have a governing statute defining its powers and responsibilities, and limitations.
- Before constituting the 22nd Law Commission —the institution should be placed under a proper parliamentary charter.

The government should determine by legislation, the composition, tenure, functions and work procedure of the Law Commission. It should be a predominantly jurists' commission, not a retired judges' collective with a sprinkling of legal scholarship and jurisprudential expertise.

Connecting the dots:

- Discuss the importance of the National Commission of India. The commission despite being one of the oldest is yet to be revamped. Comment.

WOMEN ISSUE

[Surrogacy \(regulation\) bill, 2019](#)

Part of: Mains GS- I – Society – Women issues

In News

- Lok Sabha has passed the Surrogacy (Regulation) Bill, 2019 that prohibits commercial surrogacy, but allows altruistic surrogacy.
- **Surrogacy:** Surrogacy is a practice where a woman gives birth to a child for an intending couple with the intention to hand over the child after the birth to the intending couple.
- **Commercial Surrogacy:** It refers to any surrogacy arrangement in which the surrogate mother is compensated for her services beyond reimbursement of medical expenses.
- **Altruistic Surrogacy:** In this a woman volunteers to carry a pregnancy for intended parents without receiving any monetary compensation in return. Most altruistic surrogacies are between family members or close friends.
- The bill provides for constituting a **National Surrogacy Board**, State Surrogacy Boards, and the appointment of appropriate authorities **for the regulation of the practice** and process of surrogacy.
- The offences under the Bill include undertaking or advertising commercial surrogacy, exploiting the surrogate mother and abandoning, exploiting or disowning a surrogate child.

Do you know?

- India has emerged as a hub for surrogacy in recent years with 2000 to 3000 surrogacy clinics running illegally in the country.
- Commercial surrogacy is banned and considered illegal in many countries including New Zealand, the United Kingdom, China, South Africa, Spain, and Switzerland.

[The Surrogacy \(Regulation\) Bill, 2019](#)

CONTEXT:

- The Surrogacy (Regulation) Bill, 2019 was introduced by the Minister of Health and Family Welfare,
- The Bill defines surrogacy as a practice where a woman gives birth to a child for an intending couple with the intention to hand over the child after the birth to the intending couple.

Regulation of surrogacy:

- The Bill prohibits commercial surrogacy, but allows altruistic surrogacy.

- Altruistic surrogacy involves no monetary compensation to the surrogate mother other than the medical expenses and insurance coverage during the pregnancy.
- Commercial surrogacy includes surrogacy or its related procedures undertaken for a monetary benefit or reward (in cash or kind) exceeding the basic medical expenses and insurance coverage.

Purposes for which surrogacy is permitted:

Surrogacy is permitted when it is:

- For intending couples who suffer from proven infertility
- Altruistic
- Not for commercial purposes
- Not for producing children for sale, prostitution or other forms of exploitation; and
- For any condition or disease specified through regulations.

Eligibility criteria for intending couple:

The intending couple should have a 'certificate of essentiality' and a 'certificate of eligibility' issued by the appropriate authority.

A certificate of essentiality will be issued upon fulfilment of the following conditions:

- A certificate of proven infertility of one or both members of the intending couple from a District Medical Board
- An order of parentage and custody of the surrogate child passed by a Magistrate's court; and
- Insurance coverage for a period of 16 months covering postpartum delivery complications for the surrogate.

The certificate of eligibility to the intending couple is issued upon fulfilment of the following conditions:

- The couple being Indian citizens and married for at least five years
- Between 23 to 50 years old (wife) and 26 to 55 years old (husband);
- They do not have any surviving child (biological, adopted or surrogate); this would not include a child who is mentally or physically challenged or suffers from life threatening disorder or fatal illness; and
- Other conditions that may be specified by regulations

Eligibility criteria for surrogate mother:

To obtain a certificate of eligibility from the appropriate authority, the surrogate mother has to be:

- A close relative of the intending couple;
- A married woman having a child of her own;
- 25 to 35 years old;
- A surrogate only once in her lifetime; and
- Possess a certificate of medical and psychological fitness for surrogacy. Further, the surrogate mother cannot provide her own gametes for surrogacy.

Appropriate authority:

The central and state governments shall appoint one or more appropriate authorities within 90 days of the Bill becoming an Act.

The functions of the appropriate authority include;

- Granting, suspending or cancelling registration of surrogacy clinics;
- Enforcing standards for surrogacy clinics;
- Investigating and taking action against breach of the provisions of the Bill;
- Recommending modifications to the rules and regulations

Registration of surrogacy clinics:

- Surrogacy clinics cannot undertake surrogacy related procedures unless they are registered by the appropriate authority. Clinics must apply for registration within a period of 60 days from the date of appointment of the appropriate authority.

National and State Surrogacy Boards:

The central and the state governments shall constitute the National Surrogacy Board (NSB) and the State Surrogacy Boards (SSB), respectively.

Functions of the NSB include,

- Advising the central government on policy matters relating to surrogacy;
- Laying down the code of conduct of surrogacy clinics; and
- Supervising the functioning of SSBs.

Parentage and abortion of surrogate child:

A child born out of a surrogacy procedure will be deemed to be the biological child of the intending couple. An abortion of the surrogate child requires the written consent of the surrogate mother and the authorisation of the appropriate authority. This authorisation must be compliant with the Medical Termination of Pregnancy Act, 1971. Further, the surrogate mother will have an option to withdraw from surrogacy before the embryo is implanted in her womb.

Offences and penalties:

- The offences under the Bill include:
 - Undertaking or advertising commercial surrogacy;
 - Exploiting the surrogate mother;
 - Abandoning, exploiting or disowning a surrogate child; and
 - Selling or importing human embryo or gametes for surrogacy.
- The penalty for such offences is imprisonment up to 10 years and a fine up to 10 lakh rupees. The Bill specifies a range of offences and penalties for other contraventions of the provisions of the Bill.

Laws Governing Surrogacy in Different Countries

While countries like Britain, America, Australia, the Netherlands and Denmark are among those where altruistic surrogacy is legal, countries such as France, Germany, Italy, Spain, Portugal and Bulgaria prohibit all forms of surrogacy.

- Armenia, Georgia, Kazakhstan, Russia, Ukraine allow both altruistic and commercial surrogacy.
- Kenya, Malaysia and Nigeria do not prohibit surrogacy but have no formal law to regulate the practice.
- The Czech Republic, Colombia, Chile and Hungary are among countries with unregulated surrogacy.

In Britain

- Commercial Surrogacy is not legal in the United Kingdom.
- The surrogate is the child's legal parent at birth. Legal parenthood can be transferred by parental order or adoption only once the child is born.

In USA

- The surrogacy laws vary from state to state.
- Surrogacy friendly states allow both commercial and altruistic surrogacy. Arkansas, California, New Hampshire are some such surrogacy-friendly states.
- New York does not allow commercial surrogacy and Michigan forbids absolutely all surrogacy agreements.

In Canada

- Canada's Assisted Human Reproduction Act permits only altruistic surrogacy.
- Surrogate mothers may be reimbursed only for approved expenses.
- However, all surrogacy arrangements are illegal in Quebec in Canada.

Conclusion:

- The Surrogacy (Regulation) Bill 2019 cements the ban on commercial surrogacy, but it fails to effectively tackle the larger social, physical, psychological, emotional and economic issues that continue to challenge the welfare and safety of both the surrogate mother and the child.
- Just the removal of the commercial aspects in the current surrogacy arrangements does not remove the chances of exploitation. So the rights of surrogate mother and child born must comprehensively be formulated, along with that ART must be regulated thoroughly.

Connecting the dots:

1. Discuss the provisions and challenges of surrogacy regulation bill 2019.

[Abortion](#)

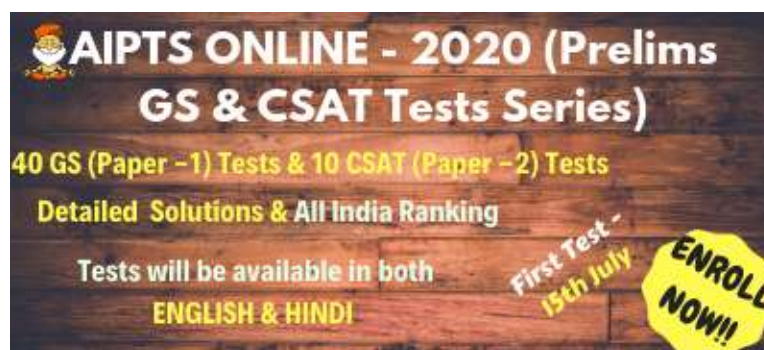
Part of: Mains GS- I – Society – Women issues

In News

- Government has initiated the process for an **inter-ministerial consultation** on raising **the gestation period for terminating a pregnancy to 24 weeks**, from 20 at present, in case of health risk to the mother or foetus.
- The Supreme Court, in 2017, had declined to amend the Medical Termination Pregnancy (MTP) Act which prohibits termination of pregnancy beyond 20 weeks, saying that the issue fell within the legislative realm.
- The amendment in the MTP act aims to provide equal reproductive rights and also a provision for unmarried females and widows to undergo legal abortion.
- Presently, woman must seek legal recourse if the pregnancy has gone over 20 weeks to terminate the pregnancy.
- Due to slow judicial process a pregnant woman is unable to get the abortion done thus pushing her to depend on illegal service providers for termination of unwanted pregnancies

Do you know?

- A research paper recently published in The Lancet Global Health said a total of 15.6 million abortions were carried out in India in 2015. Of these, 11.5 million took place outside health facilities.
- The Parliamentary committee on Woman's health noted that awareness about abortion is very low and about 80% of women do not know that abortion is legal in India
- According to the ministry of health and family welfare, abortion deaths constitute 8% of all maternal deaths per year in India.



HEALTH ISSUE

National Medical Commission (NMC)

Part of: Mains GS II - Issues relating to development and management of Health.

In News

- National Medical Commission Bill was passed by Rajya Sabha.
- The bill proposes to repeal Indian Medical Council Act, set up an NMC replacing MCI
- Proposed NMC will approve medical colleges, conduct MBBS examinations, regulate course fees
- The bill has a provision for constitution of **4 autonomous boards**. These boards will look after issues related to UG education, PG education, assessment & accreditation of institutions, registration of practitioners.
- The bill proposes a common final-year MBBS exam, the **National Exit Test (NEXT)**, before an individual starts practising medicine and for seeking admission to post-graduate medical courses.
- The **NMC will regulate fees for half of the seats in medical colleges** at both MBBS and postgraduate level in all private and deemed universities.
- The bill empowers the government can **grant licence to Community Health Providers (CHPs)** to practice modern medicine for primary and preventive healthcare,
- This means CHPs (presently 2.5 lakh) can then prescribe limited allopathic medicines –a power which so far possessed only by those who hold an MBBS degree.

National Medical Commission(NMC)bill 2019

Context:

- The National Medical Commission (NMC) Bill, 2019 has been passed by Rajya Sabha on August 1, 2019 even as hundreds of doctors are protesting across India. The Bill is replacing Medical Council of India (MCI) with National Medical Commission.

National Medical commission bill 2019

- Lok Sabha, the central government has made a fresh bid to replace the controversial Indian Medical Council (IMC) with a National Medical Commission (NMC) to regulate medical education and practices in India.
- While the Medical Council of India (MCI) was an autonomous body with two-third of its members (160 plus) being directly elected by the medical fraternity, the new one would have 25 members with no directly elected member.

What the Bill provides?

The National Medical Commission Bill of 2019 proposes to have four autonomous boards to take care of its different functions:

(i) Under-Graduate Medical Education Board to set standards and regulate medical education at undergraduate level

(ii) Post-Graduate Medical Education Board to set standards and regulate medical education at postgraduate level

(iii) Medical Assessment and Rating Board for inspections and rating of medical institutions and

(iv) Ethics and Medical Registration Board to regulate and promote professional conduct and medical ethics and also maintain national registers of (a) licensed medical practitioners and (b) Community Health Providers (CHPs).

- As for admissions and licensing, the Bill provides for a National Eligibility-cum-Entrance Test (NEET) for admission to all undergraduate and post-graduate "super-speciality" medical education, while providing for another one, National Exit Test (NEXT) for granting "license" to practice and admission to postgraduate "broad-speciality courses".
- The Bill also proposes for the NMC to "frame guidelines for determination of fee and other charges" for 50% of seats in private medical institutions and deemed to be universities.
- Currently, state governments determine fees for 85% of seats in such institutions and the rest are left for the management.
- Other powers of the NMC include permission to establish new medical colleges, start post-graduate courses, increase the number of seats, recognition of medical qualifications in and outside India etc

IMA's four major concerns

- **The first** one is over the CHPs being allowed to practice modern medicine. The Bill does not define who they are or what qualifications they hold and yet they are to be given licenses to the extent of one-third of the total number of licensed medical practitioners in India
- **The second** major objection is to the proposed National Exit Test (NEXT) for giving both licenses for practice (to those who have already cleared the MBBS exam) as well as for admission to post-graduate "broad-speciality courses"
- **The third** major objection is to "frame guidelines" to determine fees and all other charges for 50% of seats in private medical institutions and deemed to be universities (the MCI did not have such powers).
- **The fourth** major objection is about the power the Bill gives to the central government to give policy and other directives to the NMC and its autonomous boards which will be binding and final.

Six reasons why governments would like to regulate medical education:

1. To ensure that doctors are appropriately trained and skilled to address the prevailing disease burden
2. To ensure that medical graduates reflect a uniform standard of competence and skills
3. To ensure that only those with basic knowledge of science and aptitude for the profession get in
4. To ensure ethical practice in the interest of the patients
5. To create an environment that enables innovation and research
6. To check the corrosive impact of the process of commercialisation on values and corrupt practices.

Conclusion:

- No law is perfect. It is dependent upon the people who interpret and implement it. Government has, under this Bill, arrogated to itself an unprecedented power to appoint people in the various arms of the proposed structure. The quality and integrity of these people will then define the future of the health system in India.

Connecting the dots:

- Healthcare is an important area for development of nation and thus matters the quality of healthcare practitioners. Critically examine the salient features of National Medical Commission Bill 2019.

National Essential Diagnostics List (NEDL)

Part of: GS Prelims and Mains GS II – Issues relating to development and management of Social Sector/Services relating to Health

In News

- India has got its first NEDL finalised by the Indian Council of Medical Research (ICMR)
- It aims to bridge the regulatory system's gap that do not cover all the medical devices and in-vitro diagnostic device (IVD) as the current system is equipped to manage only few notified devices.
- **India has become the first country** to compile such a list that would provide guidance to the government for deciding the kind of diagnostic tests that different healthcare facilities in villages and remote areas require.
- NEDL would enable improved health care services delivery through evidence-based care, improved patient outcomes and reduction in out-of-pocket expenditure
- NEDL would also lead to effective utilisation of public health facilities; effective assessment of disease burden, disease trends, surveillance, and outbreak identification; and address antimicrobial resistance crisis too.
- NEDL builds upon the **Free Diagnostics Service Initiative** and other diagnostics initiatives of the Health Ministry to provide an expanded basket of tests at Public health system
- Key **challenges** anticipated during implementation of the National EDL include — Adoption by States and harmonisation with local standard diagnostic protocols and treatment guidelines, provision of requisite infrastructure, processes and human resources.

Do You know?

- **WHO** released first edition of essential diagnostics list (EDL) in May 2018 which acts a reference point for development of national EDL
- To improve the availability of accessible and quality diagnostics in public health facilities, Union Health Ministry under the aegis of National Health Mission (NHM) launched the Free Diagnostics Service Initiative (FDI) in July 2015
- Under this initiative, the NHM is supporting all states to provide essential diagnostics – laboratory and radiology at their public health facilities, free of cost

Measles

Part of: GS Prelims and Mains GS- III- Health.

In News

- Sri Lanka has become the fourth country in the Asian region –after Bhutan, Maldives and Timor-Leste – to eliminate measles
- Measles is a highly contagious viral disease
- It is transmitted via droplets from the nose, mouth or throat of infected persons
- Initial symptoms include high fever, running nose and bloodshot eyes. Several days later, a rash develops on the face and upper neck slowly spreading downwards
- It can cause life threatening complication including encephalitis (an infection that leads to swelling of brain), severe diarrhea, and dehydration, pneumonia, ear infections and permanent vision loss
- The disease is preventable though two doses of safe and effective vaccine
- Measles is considered to be eliminated when a country interrupts transmission of an indigenous virus for three years

Context:

- India ranked 4th and, according to WHO, has around 2.3 million children who remain unvaccinated for measles.

Concern:

- Globally, 20 million children did not receive measles vaccination in 2018. India had the highest incidence rate—76.4 per million population—for measles amongst children under the age of one between July 2018-June 2019. However, the overall number of children having the disease fell to 24,076 (January-June 2019) from 69,391 in 2018.

Spread of Measles and Rubella in India

- According to latest Global Measles and Rubella Update, India had 56,399 confirmed measles cases and 1,066 confirmed rubella cases in 2018.
- As per WHO, measles is a leading cause of death in children, with one-third (around 56,000 in 2011) of all measles deaths worldwide happening in India.
- Rubella causes birth defects, such as irreversible deafness and blindness in nearly 40 thousand children in India every year.
- At least 220 million children from 30 states and union territories have already been vaccinated under the nationwide campaign that started in 2017.

Key notes:

- The disease is commonly known as German measles (or three-day measles) and is symptomatically similar to measles.
- It can have devastating consequences if a pregnant mother is infected with it and the foetus may be born with incurable congenital anomalies.

- Symptoms of the infection can include cataracts and deafness.
- It can also affect the heart and the brain.
- The congenital rubella infection is believed to affect approximately 25,000 children born in India every year.
- Measles vaccine is currently provided under Universal Immunization Programme (UIP). However, rubella vaccine will be a new addition to it.

What is Measles?

- Measles is a deadly disease and one of the important causes of death in children. It is highly contagious and spreads through coughing and sneezing of an infected person. It can make a child vulnerable to life threatening complications such as diarrhoea, pneumonia and brain infection.

What is Rubella?

- Rubella is generally a mild infection, but has serious consequences if infection occurs in pregnant women, causing CRS, which is a cause of public health concern. CRS is characterized by congenital anomalies in the foetus and newborns affecting the eyes (cataract, glaucoma), ears (hearing loss), brain (mental retardation, microcephaly) and heart defects, causing a huge socio-economic burden on the families in particular and society in general.

Recent issues:

- Delhi High Court put on hold the govt plan for a measles rubella vaccination campaign in schools across the capital, saying the decision did not have the consent of parents.
- The court's order introduced a dimension to vaccination — the question of consent — that had not been adequately dealt with earlier.
- Court's order said that 'measles vaccination cannot be administered "forcibly" and without the consent of parents,' it introduced a dimension to vaccination — the question of consent — that had not been adequately dealt with earlier.

Different views on consent

- **Parents:** It is settled principle that choice of an individual, even in cases of life-saving medical treatment, is an inextricable part of dignity which ought to be protected.
- **Government:** Consent in routine immunisation is implied because it is the parents or members of the family who bring the child to the hospital or healthcare centre. For public good and for a vaccine that is tried and tested, there is ample evidence on safety and efficacy and something which is already a part of the universal immunisation programme, written consent should not be essential.
- Schools were consciously chosen, rather than health centres or hospitals, because nowhere else can such large numbers of children in the relevant age group be targeted.
- **Global practice:** Parental consent should be obtained prior to vaccination. This is the standard practice around the world. Although, World Health Organization recognises oral, written, and implied consent for vaccination, but countries are encouraged to adopt procedures that ensure that parents have been informed and agreed to the vaccination

Why India ranks 4th in terms of measles outbreak?

- Vaccination rates must rise at a large scale, especially, in conflict ridden and poor areas—the worst-hit by plummeting vaccination rates
- The migration from these regions to other countries, the problem of missing vaccination could truly become universal
- Poor healthcare infrastructure and awareness
- The ‘anti-vaxx’ propaganda is emerging as the biggest obstacle. Concrete steps to negate and curb the spread of such propaganda also need to be taken.

Connecting the dots:

1. The reported cases and deaths due to the measles are on the rise in comparison with previous years’ records. Discuss the reasons behind it. Also elaborate on what preventive steps should be taken by the government.

Drug resistant TB

Part of: GS Prelims and Mains GS II and III- Health issue and Science and Technology

In News

- The test developed by MedGenome Labs can provide a detailed analysis of every single mutation present in any TB Bacteria causing drug resistance **directly from the sputum**
- This Whole-Genome Sequencing- based Test-**SPIT SEQ** enables doctors to quickly and accurately prescribe the most effective drug to a TB patient
- The existing sputum smear microscopy, Cartridge Based Nucleic Acid Amplification Test (CB-NAAT) and culture tests are not only time-consuming but do not provide a detailed analysis of resistance developed by the patient to every single mutation in the bacteria.
- With India having the largest number of multidrug resistant (MDR-TB) TB cases, SPIT SEQ can help to achieve India’s SDG goal of eliminating TB by 2025.

Multidrug-resistant TB (MDR-TB) & Extensively drug-resistant TB (XDR-TB)

Part of: GS Prelims and Mains GS III - Science and Technology

In News

- Treating **drug-resistant tuberculosis** – like MDR-TB and XDR-TB - got a boost after U.S. Food & Drug Administration (FDA) approved a new drug **Pretomanid**.
- Pretomanid is only the third new anti-TB drug approved for use by FDA in more than 40 years.
- The drug was developed and **tested in clinical trials** by New York-based non-profit organisation **TB Alliance**

- The duration of treatment for drug-resistant TB can be drastically cut from 18-24 months to just six-nine months when pretomanid drug is used along with two already approved drugs — **bedaquiline and linezolid**.
- The all-oral, three-drug regimen can also vastly improve the treatment success rate (presently it is 30% -50%) and potentially decrease the number of deaths due to better adherence to treatment.

Do You know?

- Worldwide, **TB has surpassed HIV-AIDS as the leading cause of death due to infectious diseases**. In 2017, over 13 lakh people died of the disease.
- People with TB who do not respond to at least isoniazid and rifampicin, which are first-line TB drugs are said to have MDR-TB.
- People who are resistant to isoniazid and rifampin, plus any fluoroquinolone and at least one of three injectable second-line drugs (amikacin, kanamycin, or capreomycin) are said to have XDR-TB.
- According to WHO reports an estimated 4.5 lakh people across the world have MDR-TB and nearly 37,500 people have XDR-TB.
- India has 24% of MDR-TB cases in the world.

[Every child to get Rotavirus vaccine](#)

Context:

- Health Minister plans to provide it across all States and UTs by this September

Concerns:

- In India, every year, 37 out of every 1,000 children born are unable to celebrate their 5th birthday, and one of the major reasons for this is diarrhoeal deaths. Out of all the causes of diarrhoea, Rotavirus is a leading cause of diarrhoea in children less than 5 years of age
- Diarrhoea was one of the biggest killers in children and Rotavirus was one of the most common causes of severe diarrhoea in children less than 2 years of age.
- It is estimated that Rotavirus cause 8,72,000 hospitalisations; 32,70,000 outpatient visits and estimated 78,000 deaths annually in India. Rotavirus diarrhoea can be prevented through vaccination

What is Rotavirus?

- Rotavirus can cause diarrhoea, which can lead to dehydration (not having enough water in the body).
- Rotavirus is a contagious disease that spreads easily from child to child.
- Rotavirus spreads when a person comes in contact with the feces of someone who has rotavirus and then touches their own mouth. For example, rotavirus can spread when a child with

rotavirus doesn't wash their hands properly after going to the bathroom and then touches food or other objects.

Symptoms

- Severe diarrhoea
- Throwing up
- Dehydration
- Fever
- Stomach pain

World Health Organisation (WHO) recommends that the first dose of rotavirus vaccine be administered as soon as possible after 6 weeks of age, along with DTP vaccination (diphtheria, tetanus and pertussis).

WHO has recommended the inclusion of rotavirus vaccine in the National Schedules of the countries where under five mortality due to diarrhoeal diseases is more than 10%.

Currently, two vaccines are available against rotavirus:

- Rotarix (GlaxoSmithKline): is a monovalent vaccine recommended to be orally administered in two doses at 6-12 weeks.
- Rota Teq (Merck) is a pentavalent vaccine recommended to be orally administered in three doses starting at 6-12 weeks of age.

Monovalent vaccine and Pentavalent vaccine

- Monovalent vaccines are designed to immunize against a single antigen or single microorganism.
- Pentavalent vaccine provides protection to a child from five life-threatening diseases – Diphtheria, Pertussis, Tetanus, Hepatitis B and Haemophilus Influenzae type b (Hib).

Initiatives to be taken by the government:

- The Health Ministry has drawn an ambitious plan under the 100 days agenda of the newly elected government, wherein it has been decided to provide Rotavirus vaccine to every child across all States and Union Territories by September, 2019
- Rotavirus vaccine along with proper sanitation, hand washing practices, ORS and zinc supplementation will go a long way in reducing the mortality and morbidity due to diarrhoea in children.
- The government was also committed to increasing the full immunisation coverage and ensuring that the benefit of the life-saving vaccines was provided to every child.
- Diarrhoea can be prevented through general measures like good hygiene, frequent hand washing, safe water and safe food consumption, exclusive breastfeeding and vitamin A supplementation.
- Rotavirus vaccine was introduced in 2016 in a phased manner, beginning with 4 States initially and later expanded to 7 more States.
- The Rotavac has been introduced in India's Universal Immunisation Programme (UIP) including Inactivated Polio Vaccine (IPV), Measles, Rubella (MR) vaccine, Adult Japanese

Encephalitis (JE) vaccine, Tuberculosis, Diphtheria, Pertussis, Hepatitis B, Pneumonia and Meningitis due to Haemophilus Influenzae type b (Hib).

Connecting the dots:

- Discuss the measures taken by Government to control the communicable diseases?

PM-JAY

Part of: GS Prelims and Mains GS-II - Issues relating to development and management of Social Sector/Services relating to Health

In News

- **Cancer treatments** will soon be covered under the Ayushman Bharat Yojana- Pradhan Mantri Jan Arogya Yojana (**PM-JAY**)
- PM-JAY is the Central Government's health insurance scheme that aims to give medical cover to over 10 crore poor and vulnerable families of approximately 50 crore beneficiaries.
- The scheme provides insurance coverage of up to ₹5 lakh per family per year for **secondary and tertiary care hospitalisation**.
- So far, 16,000 hospitals have been empanelled, nearly 34 lakh beneficiaries have been admitted, and 9 crore e-cards have been issued.
- Government figures note that the estimated number of people living with cancer stands at around 2.25 million, with over 11 lakh new cancer patients registered each year.
- In India, the risk of developing cancer before the age of 75 years for males stands at 9.81% and females at 9.42%. Total deaths due to cancer in 2018 was 7,84,821 (Men: 4,13,519; Women: 3,71,302).
- Lung cancer is the most common type of cancer in India, followed by breast cancer and oral cancers.

Government realised that cancer care costs were causing **massive financial crisis** among people and thus aims to bring cancer within the fold of PM-JAY

Notifiable disease

Context:

- A month after Union Health Minister Dr HarshVardhan asked the Delhi government to make malaria and dengue notifiable diseases, the South Delhi Municipal Corporation (SDMC) has initiated the work to notify malaria in the capital.

What is a Notifiable disease?

- A Notifiable disease is any disease that is required by law to be reported to government authorities. The collation of information allows the authorities to monitor the disease, and provides early warning of possible outbreaks.
- The World Health Organization's International Health Regulations, 1969 require disease reporting to the WHO in order to help with its global surveillance and advisory role.
- Making a disease legally notifiable by doctors and health professionals allows for intervention to control the spread of highly infectious diseases.
- Registered medical practitioners need to notify such diseases in a proper form within three days, or notify verbally via phone within 24 hours depending on the urgency of the situation.

Advantages:

- This means every government hospital, private hospital, laboratories, and clinics will have to report cases of the disease to the government.
- The process helps the government keep track and formulate a plan for elimination and control.
- In less infectious conditions, it improves information about the burden and distribution of disease.
- The Centre has notified several diseases such as cholera, diphtheria, encephalitis, leprosy, meningitis, pertussis (whooping cough), plague, tuberculosis, AIDS, hepatitis, measles, yellow fever, malaria dengue, etc. The onus of notifying any disease and the implementation lies with the state government.
- Any failure to report a notifiable disease is a criminal offence and the state government can take necessary actions against defaulters.

Key notes:

- According to Indian Council of Medical Research (ICMR) report titled "India: Health of the Nation's States", contribution of Non-Communicable Diseases (NCDs) to total death in the Country was 61.8% in 2016, as compared to 37.9% in 1990.
- Some examples of common NCDs, i.e. diabetes, hypertension and cancers (Oral, Breast and Cervical cancer) are on the rise in India.
- Risk factors for NCDs inter alia include ageing, unhealthy diet, lack of physical activity, high blood pressure, high blood sugar, high cholesterol and overweight
- Also In the States of Kerala, Goa and Tamil Nadu, due to epidemiological transition, fewer deaths are recorded for communicable, maternal, neonatal and nutritional diseases, thereby raising the share of NCDs in total deaths

Epidemiologic Transition

- The epidemiologic transition is that process by which the pattern of mortality and disease is transformed from one of high mortality among infants and children to one of degenerative and man-made diseases (such as those attributed to smoking) affecting principally the elderly.

Though public health is a State subject, Central Government supplements the efforts of the State Governments.

For example:

- National Programme for Prevention and Control of Cancer, Diabetes, Cardiovascular Diseases and Stroke (NPCDCS) is being implemented under the National Health Mission (NHM)
- The objectives of the programme include health promotion activities and opportunistic screening for common Non-Communicable Diseases (NCDs) including cancer
- Key components of population-based screening include community-based risk assessment, screening, referral, and follow up of all individuals of 30 years and above for common NCDs
- The initiative will help in early diagnosis and will generate awareness on risk factors of NCDs.
- Citing growing occurrence of cancer in India, the Union government sought to enhance the facilities for tertiary care of cancer.

The Central Government is implementing Strengthening of Tertiary Care Cancer facilities scheme to support setting up of State Cancer Institutes (SCI) and Tertiary Care Centres (TCCC) in different parts of the country.

- Oncology in its various aspects has a focus in case of new AIIMS and many upgraded institutions under Pradhan Mantri Swasthya Suraksha Yojana (PMSSY).
- Affordable Medicines and Reliable Implants for Treatment (AMRIT) Deendayal outlets have been opened at 159 Institutions/Hospitals with an objective to make available Cancer and Cardiovascular Diseases drugs and implants at discounted prices to the patients.
- Jan Aushadhi stores are set up by the Department of Pharmaceuticals to provide generic medicines at affordable prices.

Conclusion:

- There is a greater need to tailoring strategies not just State by State but in some cases district by district to end the disease. It is also high time that a collective demand for timely provision of amenities is made at the community level and a sense of shared responsibility by the citizenry to ensure that the gains from government's efforts to reduce the incidence of vector-borne diseases bear fruit.

Connecting the dots:

- Diseases like Dengue and Chikungunya claim many lives every year. The panic generated and the scales of response there on give these diseases the essential characteristics of a disaster. Discuss. Also examine the areas that require immediate attention to address such medical disasters.

[How yoga can boost exports](#)

Context:

- Linking to the wellness carnival of the International Yoga Day (IDY) on June 21, many yoga studios are opening up both in India and globally.

Statistics:

- As estimated by the '2016 Yoga in America Study', the US continues to lead with the rise in number of yoga practitioners from 20.4 million in 2012 to 36.7 million in 2016.
- Over the same period, the spending by such professionals on yoga classes, clothing, equipment and accessories has increased by \$6.1 billion (\$16.8 billion during 2016).
- Conversely, Asia is leading in wellness trips, where China and India are the top countries, adding over 12 million and 17 million trips, respectively, during 2015-17, as per the Global Wellness Economy Monitor 2018.
- Till December 2016, India had trained and certified 799 yoga professionals as reported by the ministry of AYUSH.
- India is the second-largest exporter of Ayurveda, Yoga, Naturopathy, Unani, Siddha and Homoeopathy (AYUSH) products with permission of 100% FDI therein.
- But the government is yet to fully utilise the trade potential in yoga industry, which exists in both services and manufacturing.

Growing trends in Yoga

- Trends suggest a growth in cross-border movement of yoga professionals (teachers, practitioners, trainers, instructors), which can be referred to as the 'software' part of yoga.
- Another growing segment is trade in yoga accessories, dealing with the 'hardware' part of yoga (technically considered to be part of sports goods sector).
- With growing need for yoga services mainly post-IDY, the demand of and spending on accessories has risen. Broadly, yoga accessories are the tools that support yoga, such as mats, bricks, blocks, clothes and other equipment.
- Several foreign brands, too, have introduced special yoga mats, and various manufactures are shifting to recyclable, renewable or eco-friendly sources for making such equipment.

Where India is placed in terms of trade of yoga services and equipment, as compared to the US, Europe and East Asia?

- The government has been opening centres in such regions to promote cultural exchange on yoga, music, dance, etc.
- For example,

India and Japan committed to liberalisation, under the Comprehensive Economic Partnership Agreement (CEPA) in 2011, across all services modes to cover provisions relating to movements of teachers and contractual service providers in the field of yoga, among others.

In July 2018, under India-Korea CEPA, both the countries agreed on certain terms related to export of yoga from India—Indian trainers/teachers/instructors to be sent to Korea for imparting lessons or providing guidance to Korean hospitals, etc, and instructors as well as Indian yoga institutes allowed to set up centres in South Korea .

In its foreign trade policy Statement 2017 Mid-Term Review, the government emphasised on using branding/marketing campaign to facilitate exports "of commodities and services in which India has traditional strengths, such as handicrafts and yoga."

Conclusion:

- The challenge, though, remains for researchers and policymakers to verify the accuracy of data and information available on private websites with official government sources. Nevertheless, investment in promoting yoga exports and value addition under Make in India can support growth of concerned manufacturers and give the country a required export boost.

Connecting the dots:

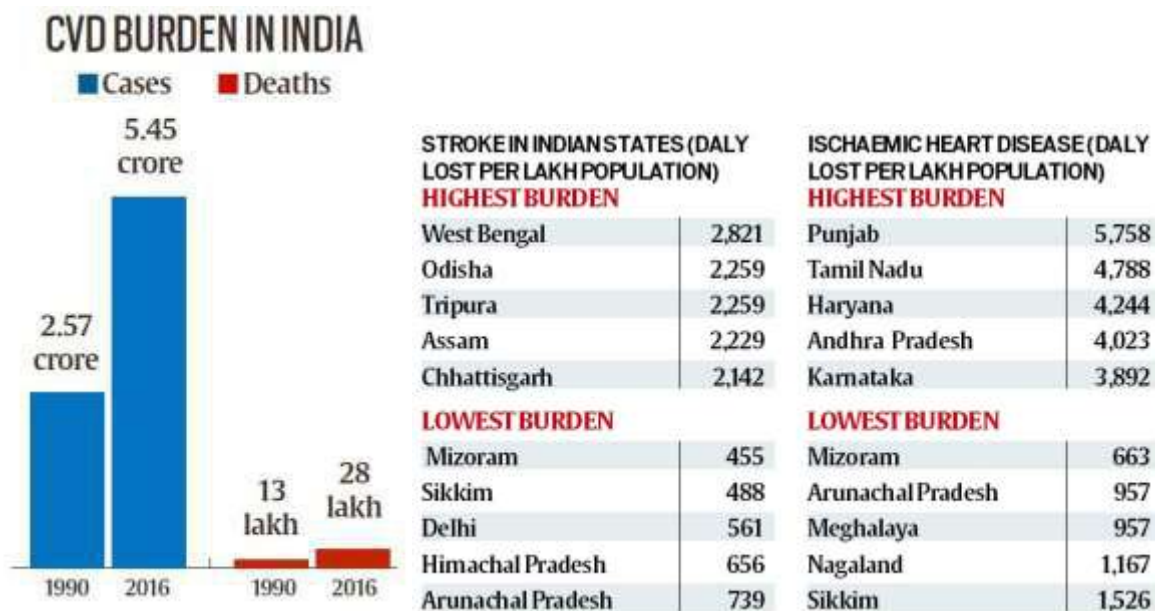
- In the Indian medicinal system, Yoga is the most popular and widely accepted form. Can you describe the benefits of Yoga? Also discuss its branding potential for India.

Cardiovascular disease burden (CVD)

Part of: GS Prelims and Mains GS-II – Issues relating to Health

In News

- Three-quarters of CVD-related deaths happen in lower-middle income countries, according to the **WHO**, which classifies India among such countries
- In India, the leading CVD diseases are ischaemic heart disease and stroke, contributing 61.4 % and 24.9 % of total DALYs (**Daily Adjusted Life Years**) lost from CVDs
- The research study found that among Indian states, West Bengal, Odisha and Tripura have the highest burden whereas Mizoram, Sikkim and Delhi have the lowest **burden of strokes** in terms of crude DALY rates.
- In the case of ischaemic heart disease, Punjab, Tamil Nadu and Haryana have the highest burden while Mizoram, Arunachal Pradesh and Meghalaya have the lowest



<https://images.indianexpress.com/2019/08/lanet.jpg>

<https://images.indianexpress.com/2019/08/cvd.jpg>

Do You Know

- DALY = **Disability Adjusted Life Year** = the sum of years of **potential life lost** due to premature death, and the years of productive life lost due to disability.
- DALYs are used to measure the combined quantity and quality of **life** of a population.
- **One DALY can be thought of as one lost year of 'healthy' life.**
- The sum of these DALYs across the population, or the burden of disease, can be thought of as a measurement of the gap between the current health status and an ideal health situation where the entire population lives to an advanced age, free of disease and disability - **WHO**

Anti-microbial resistance

Part of: GS Prelims and Mains GS-II – Issues relating to Health

In News

- The government has commissioned a ₹9.3 crore study to check antibiotic resistance in along the entire length of the river **Ganga**.
- Agencies involved: Motilal Nehru Institute of Technology, Allahabad; the National Environmental Engineering Research Institute (NEERI), Nagpur; Sardar Patel Institute of Science & Technology, Gorakhpur and two private companies Phixgen and Xcelris Labs.
- The aim of the research project is to indicate the type of “**contamination**” (sewage and industrial) in the river and “**threat** to human health (antibiotic resistance surge) and identifying **sources** of Eschericia coli
- **Eschericia coli** is a type of **bacteria** that lives in the gut of animals and humans. Though it is harmless, some species have been **linked to intestinal disease** as well as **aggravating antibiotic resistance**.

Do You know?

- Residues of antibiotics reach water bodies through waste discharged from households and industries
- These antibiotics in water lead to **evolution of bacteria** that are resistant to antibiotics, which then grow in numbers and spread in the environment.
- Research has shown that levels of resistance genes that lead to “superbugs” (antibiotic-resistant) were about 60 times greater during the pilgrimage months of May and June than at other times of the year.

Jan Aushadhi Sugam

Part of: GS Prelims and GS Mains II – e-governance

In News

- Union Minister for Chemicals launched a mobile application “**Jan Aushadhi Sugam**” to enable people to search Jan Aushadhi generic medicine stores.
- The app also enables search of Jan Aushadhi generic medicines, analyse product comparison of Generic vs Branded medicine in form of MRP & overall Savings, etc
- Government also announced that “**Jan Aushadhi Suvidha Oxo-Biodegradable Sanitary Napkin**” will now be available at only One Rupee per pad (earlier cost was Rs 2.50 per pad).
- Jan Aushadhi Suvidha comes with a special additive, which makes it biodegradable when it comes in contact with oxygen after being discarded.

Do You know?

- About 28 million girls are reported to be leaving education because of lack of availability of good quality Sanitary Napkin” pads at reasonable cost.
- Jan Aushadhi Suvidha is being made available for sale in more than **5500 PMBJP** (Pradhan Mantri Bhartiya Jan Aushadhi Pariyojana) Kendras across the country.
- Bureau of Pharma PSUs of India (**BPPI**) is the implementing agency of PMBJP
- BPPI was established as an **independent society** in December, 2008 under the Department of Pharmaceuticals, Government of India.

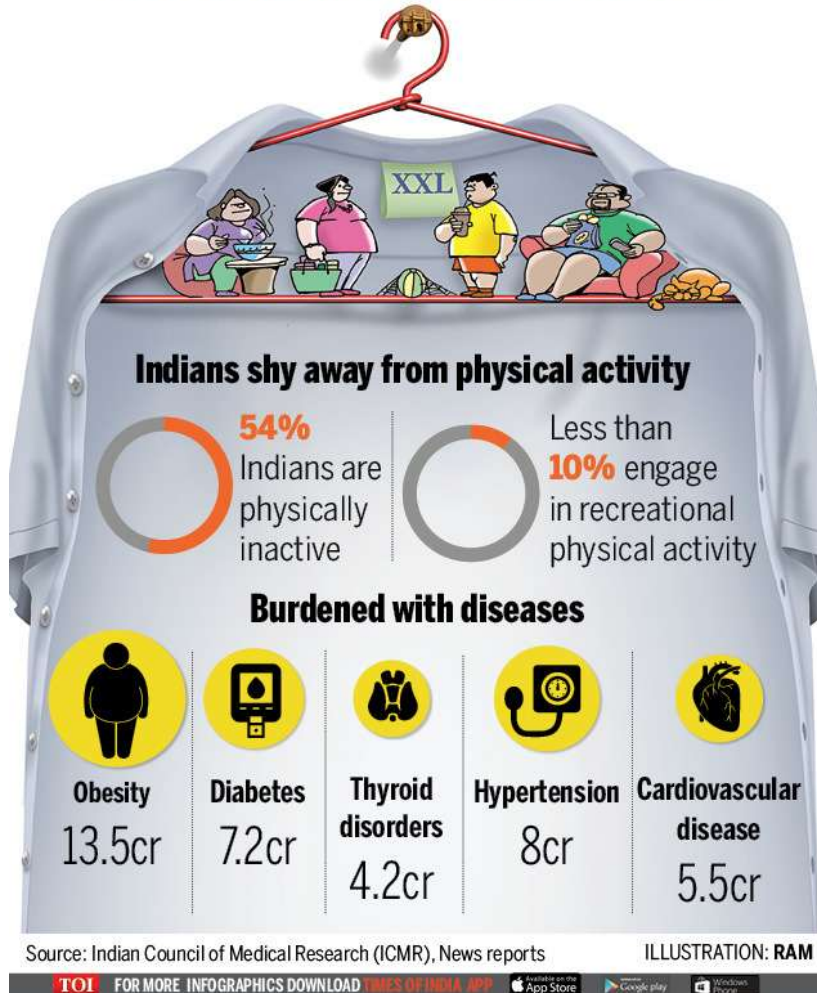
Fit India Movement

Part of: GS Prelims and Mains GS-II – Issues relating to Health

In News

- Prime Minister Narendra Modi launched the Fit India Movement on the occasion of **National Sports Day**.
- The campaign is aimed at encouraging people to integrate **physical activity and sports** in their **everyday lives**.
- Technology has contributed to a sedentary lifestyle which has led to increase in **lifestyle diseases** like diabetes & hypertension, thus fitness is the need of the hour.
- The **28-member government committee** headed by Sports Minister has been formed to take the movement forward.
- **National Sports Day** is celebrated on **29th August**, the birth anniversary of hockey legend **Major Dhyan Chand**.
- On this Day, President confers the **National Sports Awards**, National Adventure Awards, Arjuna Award, Khel Ratna, Dronacharya Award and Dhyanchand Award to recognise the exceptional achievements of Indian sportspersons.

WHY WE NEED 'FIT INDIA MOVEMENT'



<https://static.toiimg.com/img/70891964/Master.jpg>

GOVERNMENT SCHEMES

Institutions of Eminence

Part of: GS Prelims and Mains GS- II – Issues relating to development and management of Education

In News

UGC recommends 20 institutions for Institutes of Eminence

Background:

- After no Indian University found a place in World University ranking in 2017, the government decided to set up Institutions of eminence in India
- A notification released by UGC in Sep 2017, proposed to establish 20 such world class institutes (10 public and 10 private). It provides for Greenfield category too.

Benefits of the status

- **Autonomy:** The IOE will enjoy greater autonomy in terms of deciding their fee structure and course duration & structure.
- They will be exempt from approvals of government or UGC for academic collaboration with foreign institutions
- **Funding:** The 10 public institutions selected will get Rs 1000 crore each from HRD ministry to achieve world class status. No financial assistance will be offered to private institutions

| S No | Institution | World Rankings (QS 2020) | India Rankings (QS 2019) | Recommendation of UGC | S No | Institute | India Rankings (QS 2019) | India Ranking NIRF | | UGC recommendation |
|------|---|--------------------------|--------------------------|--|------|--|-------------------------------------|--------------------|------|---|
| | | | | | | | | 2019 | 2018 | |
| 1 | IIT Bombay (INI) | 152 | 1 | Already declared IoE | 1 | BITS Pilani, Rajasthan | 17 | 23 | 17 | Already selected and given Letter of Intent |
| 2 | IIT Delhi (INI) | 182 | 4 | Already declared IoE | 2 | Manipal Academy of Higher Education | 26 | 09 | 11 | Already selected and given Letter of Intent |
| 3 | IISc Bangalore (Deemed Univ) | 184 | 2 | Already declared IoE | 3 | Jio Institute (Reliance Foundation) | Green Field (yet to be established) | | | Already selected and given Letter of Intent |
| 4 | IIT Madras (INI) | 271 | 3 | Recommended for declaring as IoE | 4 | Amrita Vishwa Vidyapeetham, | 40 | 8 | 8 | Recommended for issue of LoI |
| 5 | IIT Kharagpur (INI) | 281 | 5 | Recommended for declaring as IoE | 5 | VIT Vellore, Tamil Nadu | 44 | 19 | 16 | Recommended for issue of LoI |
| 6 | Delhi University (Central Univ) | 474 | 8 | Recommended for declaring as IoE | 6 | Jamia Hamdard, New Delhi | 51-55 | 18 | 23 | Recommended for issue of LoI |
| 7 | University of Hyderabad, Hyderabad (Central Univ) | 601-650 | 7 | Recommended for declaring as IoE | 7 | Kalinga Instt. of Industrial Technology, | 61-65 | 31 | 42 | Recommended for issue of LoI |
| 8 | Jadavpur University, Kolkata (State Univ) | 651-700 | 12 | Needs consultation with State Govt. prior to consideration | 8 | O.P JINDAL University, Haryana | 66-70 | - | - | Recommended for issue of LoI |
| 9 | Anna University, Chennai (State Univ) | 751-800 | 13 | Needs consultation with State Govt. prior to consideration | 9 | Shiv Nadar University, Uttar Pradesh | - | 52 | 48 | Recommended for issue of LoI |
| 10 | BHU, Varanasi (Central Univ) | 801-1000 | 15 | Recommended for declaring as IoE | 10 | Bharti (Satya Bharti Foundation), Delhi | Greenfield (yet to be established) | | | Recommended for issue of LoI in the vacant slot |
| 11 | Savitribai Phule Pune University, Pune (State Univ) | 801-1000 | 19 | | 11 | Azim Premji University, Bangalore | Not ranked, not considered | | | |
| 12 | AMU, Aligarh (Central Univ) | 801-1000 | 33 | | 12 | Ashoka University, Sonapat, Haryana | Not ranked, not considered | | | |
| 13 | Tezpur University (Central Univ) | Not ranked | 36 | | 13 | KREA University (IFMR), Chennai, Tamil | Not ranked, not considered | | | |
| 14 | Punjab University, Chandigarh (State/Central Univ) | Not ranked | 49 | | 14 | IHHS (Indian Institute for Human Settlements), | Not ranked, not considered | | | |
| 15 | Andhra University, Visakhapatnam (State Univ) | Not ranked | 46 | | 15 | Indian Institute of Public Health, Gandhinagar | Not ranked, not considered | | | |

<https://pbs.twimg.com/media/EA9wg2hUwAljw9d?format=jpg&name=360x360>

<https://pbs.twimg.com/media/EA9whZNUAEjBxz?format=jpg&name=360x360>

[Resource Assistance for Colleges with Excellence \(RACE\)](#)

Part of: GS Prelims and Mains GS II- Issue relating to Education

In News

- **Rajasthan** government has launched a **new higher education model** titled Resource Assistance for Colleges with Excellence.
- This model is utilized for distribution of faculties and movable assets among the government colleges at the district level to rationalise the availability of resources.
- The model will create a pool for sharing of facilities which will benefit the colleges lacking infrastructure.
- The colleges in need will submit their requirement to the nodal college in the district, which will send the teachers on deputation, if needed, and provide the facilities such as projectors, digital libraries, equipment and technicians.
- RACE will give autonomy to small colleges and help them find solutions to their problems at the local level.

[NISHTHA](#)

Part of: GS Prelims and GS Mains II – Issues relating to Education

In News

- Union Human Resource Development (**HRD**) Minister launched **NISHTHA to build capacities of 42 Lakh government teachers** across the country.
- National Mission to improve Learning Outcomes at the Elementary level (NISHTHA) is the world's largest teachers training programme of its kind
- Under it, teachers will develop their skills on various aspects related to Learning Outcomes, School Safety and Security, ICT in teaching-learning including Artificial Intelligence, Environmental Concerns and School Based Assessment in a joyful learning manner.
- Training will be conducted directly by 33120 Key Resource Persons (KRP) and State Resource Persons (SRP) identified by the State and UTs, who will in turn be trained by 120 National Resource Persons identified from NCERT, NIEPA, Kendriya Vidyalaya Sangathan (KVS), Navodaya Vidyalaya Samiti (NVS), CBSE and NGO.
- Its objective is to motivate and equip teachers to encourage and foster critical thinking in students.

[One Nation-one Ration Card scheme](#)

Part of: GS Prelims and Mains GS- III – Public Distribution System- objectives, functioning, limitations, revamping

In News

- Centre launched the One Nation-One Ration Card scheme on a pilot basis in Telangana, Andhra Pradesh, Maharashtra and Gujarat
- Families who have food security cards can buy subsidized rice and wheat from any ration shop in these states.
- Their ration cards should be linked with Aadhar Number to avail this service.
- The Centre is intended to extend the programme to all states by August next year so that the portability of the food security card implemented.
- The national portability of ration cards will ensure all beneficiaries especially the migrants in getting access to PDS across the nation from any PDS shop of their own choice

One Nation, One Ration Card (ONORC)

Part of: GS Prelims and GS Mains II – Issues relating to Public Distribution System

In News

- Last week, the government launched the pilot project for the **inter-state portability of ration cards** between Telangana and Andhra Pradesh, and between Maharashtra and Gujarat, as part of its 'One Nation, One Ration Card' scheme
- A **ration card is issued to the head of the family**, depending on the number of members in a family and the financial status of the applicant.
- It is used by households to get essential food grains at subsidised prices from designated ration shops (also called fair price shops) under the Targeted Public Distribution System (TPDS).
- Over the years, different types of ration cards were issued depending on the level of deprivation
- However, in 2013, when the National Food Security Bill was passed, different ration cards were compressed to just two — priority and Antyodaya (for the most poor).
- The **responsibility of identifying** eligible families and **issuing ration cards** to them rests with **the state/UT government**.
- This implied that beneficiaries could procure food grains only from the designated ration shops within the concerned state
- ONORC scheme has been launched keeping in mind the **internal migration** of our country, since people keep moving to different states in search of better job opportunities and higher standards of living.
- ONORC scheme helps the beneficiary to buy food grains from ration shops located in any part of the country

Do You Know?

- Ration shops can be privately owned or owned by cooperative societies or by the government.
- Ownership licenses are issued by the concerned state government.

- Presently, commodities including wheat, sugar, rice and kerosene are being allocated as part of the TPDS. State governments have the discretion to provide additional commodities

Swachh Survekshan Grameen

Part of: GS Prelims and Mains GS-II - Government policies and interventions for development in various sectors and issues arising out of their design and implementation.

In News

- Government launched the 'Swachh Survekshan Grameen 2019', which will be three times bigger in scale than the previous edition of the **rural sanitation survey**.
- It's not just a survey but an opportunity to encourage behavioural change and take sanitation to the secondary level, beyond the concept of ODF villages
- In the first edition in 2018, the survey covered over 6,000 villages across the country.
- This year the survey aims to cover 18,000 sample villages — approximately 30 per rural district — and take feedback from over 2.5 crore villagers.
- The effort is to look beyond toilets and to **kick off the Open Defecation Free Plus (ODF+) phase** — focussing on solid and liquid waste management
- The ODF-Plus programme has **four verticals** -- biodegradable waste management, plastic waste management, greywater (household waste water) management and faecal sludge management.
- For Swachh Survekshan Grameen 2019, Citizen feedback will account for 35% of the ranking of districts.
- Another 30% weightage is being given to direct observations by surveyors from third party Ipsos, who will look at the **prevalence of plastic litter and water-logging** as well as the availability and usage of toilets.
- The remaining 35% will be drawn from service-level progress measuring the final activities of the original Swachh Bharat mission.

Do You know?

- Ever since the Swachh Bharat Abhiyan was launched on Gandhi Jayanti in 2014, its main focus has been on eliminating open defecation by constructing toilets and promoting their usage through widespread behaviour change programmes.
- With the October 2, 2019 deadline looming near, and the original goal is almost achieved and the mission is moving on to its next phase (ODF+)

Tax Administration

Part of: Mains GS-II - Government policies and interventions for development in various sectors and issues arising out of their design and implementation.

In News

- All notices and orders of Income Tax Department issued on or after the 1st of October, 2019 shall carry a **computer-generated Document Identification Number (DIN)**
- It was found that majority of IT notices/orders have been issued manually, without maintaining a proper audit trail of such communication
- The initiative of DIN is intended to **maintain proper audit trail** of all such communication from IT department
- Under exceptional cases where manual communication is required to be issued, the reason for issue of manual communication without DIN has to be specified alongwith the date of obtaining written approval of the Chief Commissioner / Director General of Income-Tax.
- This is step taken by **CBDT** will bring greater **transparency** in the functioning of the tax-administration and improvement in service delivery

[Aadhaar – social media link](#)

Context:

- The Supreme Court on Tuesday stressed the need to find a balance between the right to online privacy and the right of the State to detect people who use the web to spread panic and commit crimes.
- A Bench of Justices Deepak Gupta and Aniruddha Ghose expressed concern over the dangers of the dark web.
- The Bench's comments were in response to submissions by Attorney General K.K. Venugopal, appearing for the Tamil Nadu government along with advocate Balaji Srinivasan, about the need to link social media profiles of registered users with their Aadhaar numbers, and if required, have platforms such as Facebook and WhatsApp share the 12-digit unique identity with law enforcement agencies to help detect crimes.

Arguments of Mr.venugopal in favour of linking Aadhaar with social media profiles:

- The linking of social media profiles with Aadhaar is needed to check fake news, defamatory articles, pornographic materials and anti-national and terror contents in the online media.
- He said the government found it a challenge to trace the 'originator' of such online content. The services of social media platforms, which were used to circulate such content, was the need of the hour.
- Senior advocates Mukul Rohatgi and Kapil Sibal, representing social media platforms, said they had moved the Supreme Court for the sole purpose of transferring the proceedings pending in High Courts to the apex court for adjudication.

Multiple cases:

- Facebook contended that there were four petitions — two in the Madras High Court and one each in the Bombay and the Madhya Pradesh High Courts — on the issue.

- The court, as the highest court in the country, and not the High Courts, should decide the issue that affected the privacy of an online user.
- A decision of the top court would cover the entire span of the country and would uniformly apply to all the States.
- Mr. Sibal said a decision of the Indian courts would have global ramifications.
- Both lawyers pointed out that a nine-judge Constitution Bench had declared privacy as a fundamental right associated with life and dignity under Article 21 of the Constitution.
- Mr. Venugopal asked why social media platforms have decided to approach the Supreme Court at this point of time.

Aadhaar :

- It is a 12 digit individual identification number issued by UIDAI (Unique identification authority of India) on behalf of Government of India
- It will serve as identity and address proof anywhere in India.
- It is available in 2 forms, physical and electronic form i.e. (e-Aadhaar).
- Any resident (a person who has resided in India for 182 days, in the one year preceding the date of application for enrollment for Aadhaar) of India irrespective of age, sex, class can avail it.
- The UID authority will authenticate the Aadhaar number of an individual, if an entity makes such a request. A requesting entity (an agency or person that wants to authenticate information of a person) has to obtain the consent of an individual before collecting his information.

Benefits of Aadhaar

- JAM trinity – Jan DhanYojana, Aadhaar and Mobile numbers – This will make the government support to poor more targeted and less distortive.
- Identification of the beneficiaries of the government's welfare schemes – Aadhaar will help to remove fake and duplicates identities. It can be used to filter the list of beneficiaries and stop the leakage of public money.
- To tackle the black money issue – Use of Aadhaar in financial transactions can reduce the menace of black money in the country.
- In Income tax return – Use of Aadhaar in income tax filing will reduce the number of documents needed. It can make the process more efficient and cost-effective way.
- In Opening a bank account – There is no need to collect multiple identity proofs or run around for documentation. Your humble Aadhaar Card is ample proof of your identity and address.
- In getting subsidies directly to the bank account – By linking Aadhaar with bank accounts, subsidies like LPG will get credited to bank account directly.
- To get pension money on time – By just registering with the Aadhaar number, pension-related documentation process will be eased and a timely payout of pension money can be ensured.
- The issue of digital Life certificate – Aadhaar number can be used to get a digital life certificate. It will help pensioners without the hassle of physically going to the bank and submitting the life certificate.
- Easy Provident Fund disbursement – The Aadhaar will ensure that the Provident Fund money is not diverted and is disbursed directly to the pensioner's account.

- Accepted as a proof of address by Securities and Exchange Board of India (SEBI) for investing in stock market.
- Mapping development parameters – In critical sectors of the country like healthcare and education, Aadhar can be used to map the development process.
- It can help to map skilled manpower, based on the vocational training acquired by the individual, to suitable job vacancies/ skill requirements of the State.

Legislative Backing for Aadhaar: How will it help?

- The Narendra Modi government introduced the Aadhaar (Targeted Delivery of Financial and Other Subsidies, Benefits and Services) Bill, 2016 in the Lok Sabha on Thursday. The legislation seeks to provide statutory backing to Aadhaar and enable targeted delivery of subsidies and other benefits to the intended beneficiaries.
- The Bill was introduced as a money Bill in the Lower House as it can be tabled and passed only in the Lok Sabha. However opposition parties have expressed concerns about calling Aadhar as Money bill. The issue of privacy has also been one of the sticky points in this regard. The article briefly deals with the issues involved.

What makes the Aadhaar platform suitable for direct benefit transfer?

- It is transparent and has the potential to eliminate leakage. It does so by assigning a unique identity number to each resident.
- The identity remains unique because of the inclusion of biometrics like finger prints and iris.
- The platform offers benefits like portability to the beneficiaries.

There are three important issues that are debated around:

- Tabling the Aadhaar as money bill the government is setting up a dangerous precedent. With this, the Rajya Sabha cannot make amendments to money bill passed by the Lok Sabha and can only make recommendations. It also has to return money bills to the Lok Sabha within 14 days from the date of their receipt, thus ensuring a time-bound process.
- Privacy concerns around the Aadhaar project have been numerous, given that it requires the use of biometric information such as fingerprints and iris scans of citizens. Critics claim that without appropriate checks and balances, this information isn't secure, and that it can be misused by the state itself—to profile people. There needs to have a effective robust law to protect privacy of the citizens.
- The efficacy of biometric finger print is another issue that is not properly addressed. UIDAI in its various reports has come up with certain glitches that it faced during taking biometric details of a person. There are instances where people (especially in Villages) fail get proper thumb impression, apparently making them not eligible for subsidies. The government should come up with innovative solutions to address this issue

The Supreme Court upheld the validity of India's ambitious biometric identity project, 'Aadhaar', saying it benefited the marginalized and poor, but sharply reined in a government push to make it mandatory for various services.

- Aadhaar is meant to help benefits reach the marginalised sections of the society and takes into account the dignity of people not only from personal but also from community point of view.
- The panel ruled the programme had merits, but struck down provisions in the act that made its use mandatory in applications for services ranging from bank accounts to mobile telephone connections and school admissions.
- The court also ruled unconstitutional the use of Aadhaar by companies to establish an individual's identity.

Where is Aadhaar going to be required?

- Section 7 which states Aadhaar is mandatory for any government scheme that draws out of the consolidated fund of India. This means that if you want to avail benefits such as ration, LPG subsidy, MGNREGA, you have to furnish your Aadhaar number or your Aadhaar enrollment ID.
- An individual has to furnish their Aadhaar number or the enrollment ID while filing Income Tax returns.
- It has made Aadhaar-PAN card linking mandatory as well as the requirement of Aadhaar when applying for PAN card. This is an indirect link to banks, where PAN card number is mandatory. It is this part that, in a way, makes it mandatory for you to obtain an Aadhaar number.

What of the Aadhaar Act has the court struck down?

- Section 33(1) which allows disclosure of information, including identity and authentication records, if ordered by a court not inferior to that of a District Judge. Individuals should be given the opportunity of a hearing.
- Section 33(2) which allowed identity and authentication data to be disclosed in the interest of national security on direction of an officer not below the rank of Joint Secretary to the Government of India. A Judicial Officer (preferably a sitting High Court Judge) should be associated with it and that the government should bring in legislation to this effect.
- Section 47 which referred to cognizance of offences. Under this Section, no individual was allowed to file a complaint if he/she felt their data was leaked or misused. The law only allowed the court to take cognizance of a complaint filed by UIDAI or anyone authorised by it. Any individual will now be allowed to file a complaint if he/she feels their data has been compromised.
- Section 57 refers to the use of Aadhaar data by any "body corporate or person" to establish the identity of an individual. Justice Sikri, in his judgment, found this section to be unconstitutional. It was under this provision that private companies like Paytm and Airtel Payments Bank sought Aadhaar details from customers.
- The court also ruled that authentication record should not be kept beyond the period of six months and the provision that allowed archive records for five years has been struck down. It has excluded storage of meta-data of transactions by individuals. This banning means UIDAI cannot collect data sets and mine it for more data or analysis. It has also struck down data sharing with corporates.
- The Supreme Court also called for Parliament to draft and pass a data protection law immediately. "We have also impressed upon the respondents to bring out a robust data

protection regime in the form of an enactment on the basis of Justice BN Srikrishna (Retd.) Committee Report with necessary modifications thereto as may be deemed appropriate.”

Connecting the dots:

1. Are privacy concerns over Aadhaar valid? Critically examine.
2. Recently government tabled Aadhaar (Targeted Delivery of Financial and Other Subsidies, Benefits and Services) Bill, 2016 as a money bill in the Lok Sabha thus completely bypassing Rajya Sabha. Do you think this act of the government is harmful for the federalism of India. Comment.
3. Address the outstanding issues associated with converting Aadhaar into an Act of Parliament?

[Sabka Vishwas Scheme](#)

Part of: GS Prelims and GS Mains III – Indian Economy

In News

- Union Government had announced the Sabka Vishwas (Legacy Dispute Resolution) Scheme in its 2019-20 budget, which will be operationalised from September 1 till December 31, 2019.
- The two main components of the scheme are dispute resolution and amnesty
- The **dispute resolution component** is aimed at liquidating the legacy cases of central excise and service tax that are subsumed in GST and are pending in litigation at various forums
- The **amnesty component** of the scheme offers taxpayers the opportunity to pay any outstanding tax and be free of any other consequence under the law
- It provides **substantial relief in the tax dues** for all categories of cases as well as full waiver of interest, fine, penalty and complete amnesty from prosecution
- The scheme offers a relief of 70% from the duty demand if it is less than ₹50 lakh and 50% if it is more than ₹50 lakh for all cases pending adjudication or appeal in any forum.
- The scheme **aims at reducing tax litigation** and improving ease of doing business, needed at this time where businesses are facing an economic downturn.

[Ordnance factory Board \(OFB\)](#)

In News

- More than 80,000 workers of the 41 ordnance factories across the country are on strike, protesting against the proposed restructuring of the OFB
- The OFB established in 1775 is currently a department under the Defence Ministry.
- These factories manufacture weapons, ammunition, explosives and other equipment like armoured vehicles for the defence forces as well as foreign clients
- **OFB in its present structure of a departmental organisation** is not efficient in utilization of resources and competing with rivals in the private sector who have all the managerial and technical flexibility

- The government plans to **convert it into one or more corporate entities fully owned by the government**, like the other public sector units
- At least three expert committees — T K S Nair Committee (2000), Vijay Kelkar Committee on Defence Reforms (2005), and the Raman Puri Committee (2015) — had suggested such a move
- The argument is that corporatisation would improve efficiency, make products cost-competitive, enhance quality, provide operational freedom and flexibility to the OFB
- One of the fears of employees is that corporatisation is a step towards privatisation and they fear job losses

Swatantra Sainik Samman Pension Scheme

Part of: GS Prelims and GS Mains I - Society

In News

- The Supreme Court has slammed the Centre for harassing a 90-year-old freedom fighter who was struggling to get his pension under Swatantra Sainik Samman Pension Scheme
- The scheme was introduced with the object of providing **pension to freedom fighters and families of martyrs**
- The scheme is not to “reward” patriotic men and women who threw their lives into the Freedom Movement, but to **honour them and mitigate their suffering**.
- **As of March 2019, a total 1.7 lakh freedom fighters** and their eligible dependents have been sanctioned the central samman pension so far.
- It is implemented by **Ministry of Home Affairs (Freedom Fighters Division)**

Do You Know?

- Government of India introduced the 'Ex-Andaman Political Prisoners Pension Scheme' in 1969 to honour the freedom fighters who had been incarcerated in the Cellular Jail at Port Blair.
- In 1972, to commemorate the 25th Anniversary of Independence, a regular scheme for grant of freedom fighters' pension was introduced.
- Since 1980, a liberalized scheme, namely the 'Swatantrata Sainik Samman Pension Scheme, 1980' is being implemented.

National Digital Library(NDL)

Part of: GS Prelims and GS Mains II – e-governance

In News

- Bangalore University plans to launch an **e-library**, where students and staff can download books available online through the university's library app
- The university has taken up this project under the **National Digital Library of India** initiative
- **Human Resource Development Ministry** under its National Mission on Education through Information and Communication Technology launched NDL in 2018

- NDL is the **Single Window Platform** that collects and collates metadata from premier learning institutions in India and abroad, as well as other relevant sources.
- NDL is a **digital repository** containing textbooks, articles, videos, audio books, lectures, simulations, fiction and all other kinds of learning media.
- Anybody can access the digital library anytime and anywhere absolutely free of cost and is a step towards **“Padhe Bharat Badhe Bharat”**.
- As of now, there are more than 3 crore digital resources available through NDL
- More than **50 lakh students have registered** themselves in the National Digital Library with about 20 lakh active users.
- NDL has been integrated with UMANG App

Do You Know?

- UMANG stands for Unified Mobile Application for New-age Governance developed by Ministry of Electronics and Information Technology (**MeitY**) and National e-Governance Division (NeGD) to drive **Mobile Governance in India**
- UMANG provides a **single platform for all Indian Citizens** to access pan India e-Gov services ranging from Central to State to Local Government bodies and other citizen centric services.

[Compensatory Afforestation Fund \(CAF\)](#)

Part of: GS Prelims and Mains GS-II – Issues relating to Federalism

In News

- The Union Environment Ministry on Thursday transferred ₹47,436 crore to 27 States for afforestation as a part of CAF
- Levies are imposed on firms (under **Forest Conservation Act 1980**) that seeks to divert forest land for developmental activities, which are accrued in the CAF
- The amount to be paid by industry depends on the economic value of the goods and services that the razed forest would have provided.
- These funds were supposed to be disbursed to states to plant trees elsewhere so as to compensate the loss of forest due to development projects
- Only a fraction of this corpus had actually been disbursed to states, due to the **lack of a legal framework** (until CAF Act, 2016) and instances of States using it for non-forestry purposes.
- The CAF Act 2016, established an independent authority — the Compensatory Afforestation Fund Management and Planning Authority — to execute the fund.
- The rules governing the management of the fund were finalised in August 2018.
- The release of fund to States will boost the efforts of the Government towards restoration and enhancement of forest wealth, enhance bio-richness, water availability and secure ecological security of the country
- The funds will also help in **creating the additional carbon sink** to meet the nation’s INDC of 2.5 to 3 billion tonnes of carbon dioxide equivalent through additional forest and tree cover by the year 2030.

Do You know?

- The rate of diversion of forest land for non-forestry activities is roughly 20,000-25,000 hectare per year in India (as per Minister of Environment in 2016)
- **90% of CAF funds will flow to States & UT** afforestation fund which can be used for catchment area treatment, wildlife management, forest fire prevention, soil and moisture conservation work in the forest
- However, it cannot be used for payment of salary, travelling allowances, making buildings and buying office equipment for forest officers
- 10% of CAF funds will be utilized by Centre for monitoring mechanism and R&D activities

Angikaar campaign

Part of: GS Prelims

In News

- The **Union Housing and Urban Affairs Ministry** has launched the 'Angikaar campaign'.
- The campaign aims for **social behaviour change**, focusing on issues such as water & energy conservation, waste management, health, tree plantation, sanitation and hygiene for beneficiaries of completed houses under PMAY (U).
- The campaign will include door to door activities, ward and city level events.
- For this purpose, the campaign will **converge with schemes and Missions of other Ministries** dealing with these subjects, especially **Ujjwala yojana** for gas connection and **Ayushman Bharat** for health insurance.
- It will be initiated in all target cities on 2nd October 2019 and culminate on the occasion of **Human Rights Day, 10th December, 2019**.

Do You Know?

- PMAY- Urban envisions provision of Housing for All by 2022, when India completes 75 years of its Independence
- The scheme has following four verticals
 - Slum **rehabilitation of Slum Dwellers** with participation of private developers using land as a resource.
 - Promotion of Affordable Housing for weaker section through **credit linked subsidy**.
 - **Affordable Housing** in Partnership with Public & Private sectors.
 - **Subsidy** for beneficiary-led individual house construction /enhancement.



IASbaba

One Stop Destination for UPSC Preparation

Email ID: support@iasbaba.com
 Website: www.iasbaba.com
 Ph. No: +91 11-41678500/+91 11-41672600

To Know more about TLP PLUS
 2020 and TLP CONNECT 2020
 Scan Now.



INDEPENDENCE DAY OFFER
 Avail Additional **15% OFF** TILL
AUG 31st



IASbaba In Delhi

Programs available in Delhi:

- **PRELIMS OFFLINE – ALL INDIA PRELIMS TEST SERIES (AIPTS) 2020**
 40 General Studies (Paper 1) + 10 CSAT (Paper 2) Tests= Total 50 Tests
- **TLP PLUS 2020**
EXCLUSIVE MAINS MENTORSHIP Programme.
- **TLP CONNECT 2020**
 - Most Comprehensive Integrated Programme covering **Prelims + Mains + Interview**. **It's an Incentive-based Programme**, which runs in 3 phases. In Total **13 Months** Programme.
 - A dedicated **Mentor** to guide you through all stages of the exam.
 - Focus on Integration of Prelims and Mains preparation with a **single Schedule**.
 - Most **Practical Planning** with **45 Prelims Tests** (35 GS + 10 CSAT) and **30 Mains Tests** (12 Sectional, 2 Tests Exclusively on Ethics Case Studies, 8 Essay Tests, 8 Comprehensive Mock Tests)



Special Features (TLP PLUS and TLP CONNECT):

- **SUPER 50+ Scholarship Exam** - The entire TLP Connect/TLP Plus programme will be completely **FREE** for **Top 50 Students** (both Online and Offline mode).
For others, based on your performance you will be given a discount of **50%, 25%, 10%**. The **Exam will be held on 2 Days**, you can **either** take it on **31st August or 1st September 2019**.
- If you are clearing UPSC PRELIMS 2020, then **2nd Phase** [June 2020 to September 2020 -3 Months] **TLP Mains Mentorship will be completely FREE!!**
- If you are clearing UPSC MAINS 2020, then **3rd Phase Interview Mentorship Programme (IMP) -will be completely FREE!!**
- **Babapedia (Prelimspedia + Mainspedia): one-stop destination for all your current affairs needs – FREE!!**

* At Delhi, we have our own independent building. We aim to build a **super specialization centre** for PRELIMS CUM MAINS. There is a Separate **Study Centre, Discussion Room** available.

Why IASbaba?

- IASbaba's TLP Mains Hit Ratio – **80% (for 3 consecutive years)**
- IASbaba's ILP, AIPTS (Prelims Test Series), **60 Day Plan Hit Ratio – 70% (for 3 consecutive years)**
- **300+ Ranks from ILP and TLP Programme alone in the last 3 Years**

DELHI CENTRE:

5B, PUSA road , Opposite to Metro
 Pillar 110, Karol Bagh,
 New Delhi -110005
 (Landmark: CROMA Store)
 Ph. No: +91 11-41678500/
 +91 11-41672600



INTERNATIONAL

US says China manipulates Yuan

Context:

- The US Treasury Department declared that China is a currency manipulator. The move came after the People's Bank of China (PBOC), the central bank of China, allowed the yuan to suddenly depreciate (or lose value) relative to the dollar by 1.9 per cent — one of the biggest single-day falls.

Concern:

- The on going trade war between the world's two biggest economies was now turning into a currency war as well.

What is a currency's exchange rate?

- An exchange rate regime is how a nation manages its currency in the foreign exchange market. An exchange rate regime is closely related to that country's monetary policy.

Example:

- In many ways, the exchange rate of your currency is the fundamental price in the economy. If an Indian car is worth Rs 10 lakh, then that is all the information we need to conduct that transaction; we do not have to wonder "what is the price of a rupee?". However, if we're trying to buy a car that was produced in, say the US, we would need more information than just its price (say, \$15,000 in the US). This is because buying the imported car involves two transactions: one, using your rupees to buy 15,000 dollars; two, using these dollars to buy the car.
- It often determines the affordability of buying or selling internationally. So, if the rupee is at 70 to a dollar, the car may be affordable, but not so at 100 to a dollar.
- There is a flip side to this picture. While a stronger rupee (that is 70/\$, instead of 100/\$) is better for you as a consumer, it is worse for you if you were an Indian car manufacturer hoping to sell your car in the US. That's because the rupee's strength makes your car that much less affordable to US consumers.

How are exchange rates determined?

- In an ideal world, the exchange rate for any currency would be determined by the interplay of its demand and supply.
- For example: If more Indians want to buy US goods, there would be a higher demand for the dollar relative to the rupee. This, in turn, would mean the dollar would be "stronger" than the rupee — and gain in strength as the demand increases. If demand falls, the dollar would depreciate relative to the rupee (or the rupee would appreciate relative to the dollar).

What is currency manipulation?

- The real world is far from ideal. Most governments and central banks are bothered about generating more growth and employment at home.

- A weaker domestic currency comes in very handy when governments are trying to attract foreign demand and boost exports.
- China's economic growth has been essentially fuelled by exporting to the world.
- Currency manipulation happens when governments try to artificially tweak the exchange rate to gain an "unfair" advantage in trade.
- In other words, if China's central bank buys dollars in the forex market, it can artificially weaken the yuan — and Chinese goods will then become more affordable (and competitive) in the international market.
- Some amount of such "intervention" by central banks is allowed to reduce wild fluctuations in the exchange rate. But excessive and undisclosed interventions are not considered fair.

How did the US conclude that China was manipulating the yuan?

- In the so-called "FX report" released by the US Treasury Department in May, it found that the yuan's depreciation against the dollar was far more than its depreciation against a trade-weighted basket of 24 currencies .
- It also found that the yuan depreciated more than what it should have, if the fall were due only to the known interventions by the Chinese central bank. The US accused the People's Bank of China of using China's state-owned enterprises to do its dirty work.
- The US has also found that Chinese authorities intervene more assiduously when the yuan starts appreciating against the dollar, but look the other way when the yuan starts weakening.

Connecting the dots:

1. How is the currency exchange rate determined? Who determines it ?
2. Explain the Exchange rate in terms of Purchasing power parity (PPP).
3. What is Nominal Effective Exchange Rate (NEER), Real Effective Exchange Rate (REER)?

Iran-West tensions

Part of: GS Prelims and GS Mains II – International relations

- An **Iranian oil supertanker** that was seized by the UK nearly a month ago amid escalating tension between Tehran and the West, was released on Sunday and was moving away from Gibraltar.
- The ship, now renamed **Adrian Darya 1**, was previously known as **Grace 1**. It has a cargo of at least \$130m worth of light crude oil.
- British Royal Marines had seized the vessel in Gibraltar in July on **suspicion that it was carrying oil to Syria**, a close ally of Iran, in **violation of EU sanctions**.
- The decision came after Gibraltar's government said it had received written assurances from Iran that the ship would not be headed for countries "subject to European Union sanctions".

Do You Know?

- **Gibraltar is a British Overseas Territory** and headland, on Spain's south coast.
- In 1704, Anglo-Dutch forces captured Gibraltar from Spain during the War of the Spanish Succession on behalf of the Habsburg claim to the Spanish throne. The territory was ceded to Great Britain in perpetuity under the Treaty of Utrecht in 1713
- The seizure of Grace 1 triggered a sharp deterioration in relations between Iran and the United Kingdom.
- Tehran subsequently detained the **British-flagged tanker** in what was seen as a tit-for-tat move. That tanker, the **Stena Impero**, is still in Iranian custody.
- US court had issued a warrant for the seizure of the Iranian Oil tanker, on the grounds that it had links to Iran's Islamic Revolutionary Guard Corps (IRGC), which US has designated a "terrorist" organisation.
- Gibraltar's government however said that it could not comply with the US court's warrant because of European law.



<http://www.operationworld.org/files/ow/maps/lgmap/gibr-MMAP-md.png>

[Financial Action Task Force \(FATF\)](#)

Part of: GS Prelims and GS Mains II – International issues

In News

- Terror funding watchdog FATF Asia-Pacific Group '**blacklists**' **Pakistan**
- Pakistan has been placed on the lowest rung, or "Enhanced Expedited Follow Up List (Blacklist) of the **Financial Action Task Force's Asia Pacific Group (APG)**
- The APG is one of nine regional affiliates of the FATF
- APG has found Pakistan non-compliant on 32 of the 40 compliance parameters of terror financing and money laundering

- While the placing **does not bring any new punitive measures on Pakistan**, it will mean quarterly reporting to the group on improvement in its financial safeguards.
- In June, the FATF had warned Pakistan that its failure to complete its action plan on terror financing could possibly lead to the country getting blacklisted
- The **Paris plenary** of FATF in October will decide whether to remove Pakistan from the greylist, continue the listing, or downgrade it to a blacklist of non-cooperative countries
- Officials said the downgrade might not occur, given that any three countries in the FATF can veto it, and Pakistan is likely to secure the backing of China, Turkey and Malaysia.
- Nevertheless, the APG decision on Friday would make it difficult for Pakistan to extricate itself from the greylist.

Do You Know?

- FATF is an intergovernmental organization founded in **1989** on the initiative of the **G7** to develop policies to combat money laundering.
- In 2001 its mandate expanded to include terrorism financing.

Talking trade with the EU

Concerns:

- As the economy begins to suffer from the U.S.-China trade war, it is imperative for India to pursue a free trade agreement (FTA) with the European Union (EU).
- Last month, negotiators from both sides met in Brussels, for more talks about talks, but time is now running out for New Delhi.
- Moving beyond the U.S. and China, this is the right time for India to engage the EU as an indispensable democratic partner to craft a favourable geo-economic order

A series of economic and geo-strategic factors make the need for an economic deal with the EU more urgent.

First, India risks being left behind amidst a collapsing global trade architecture, rising protectionism and a new emphasis on bilateral FTAs.

- India is the only major power lacking an FTA with any of its top trade partners, including the EU, the U.S., China and Gulf economies.
- This situation is not tenable as most trade is now driven either by FTAs or global value chains.
- The EU's revived focus on FTAs could only exacerbate this risk for India.
- In June, Brussels concluded a trade deal with Vietnam and a historic FTA with the Mercosur countries in South America.
- India, in the meantime, is hanging on to its Most Favoured Nation (MFN) status. Its status under the EU's Generalised Scheme of Preferences (GSP) will face rising competition from Pakistan or Sri Lanka, who enjoy GSP+ benefits.

Stuck in a 'grey zone'

- Without preferential FTA tariffs or GSP+ status, India will struggle to keep exports competitive for Europe, its largest trade partner where 20% of its exports land up.

Positive aspects of India include:

- India's talks with the EU have been advancing slowly but steadily
- From agriculture to intellectual property, the EU and India have quietly been exchanging and aligning views.
- New areas like e-commerce have registered significant convergence because India's position on data privacy is not that different from the EU's.
- As with the EU-Japan deal, India may wish to proceed at two speeds: it could delay discussions about free flow of data for a few years and freeze differences on the tax moratorium issue or data localisation, even while committing to liberalise in other areas.

Second, beyond mere economic cost-benefit analysis, India must also approach an EU FTA from a geo-strategic perspective.

- With Mr. Trump's hostile spotlight focussing on India, and lingering concerns about the Regional Comprehensive Economic Partnership, New Delhi must realise the long-term strategic benefits of a trade deal with Europe.

Democratic regulations

- EU negotiators are now more willing to make concessions on labour or environmental regulations, which used to be insurmountable obstacles.
- The collapse of the Transatlantic Trade and Investment Partnership and concerns about excessive economic reliance on China have propelled the EU to become a little more pragmatic, which New Delhi should leverage before it's too late.
- The EU also offers India a unique regulatory model that balances growth, privacy and standards.
- India's governance framework shares the European norms of democratic transparency and multi-stakeholder participation on a variety of new technological domains, from regulating artificial intelligence to 5G networks.
- New Delhi must see this as a strategic premium that is not accounted for in a strict cost-benefit economic analysis.

Key notes:

- A Free Trade Agreement or FTA is an agreement between two or more countries where the countries agree on certain obligations that affect trade in goods and services, and protections for investors and intellectual property rights, among other topics.
- FTAs normally cover trade in goods (such as agricultural or industrial products) or trade in services (such as banking, construction, trading etc.). FTAs can also cover other areas such as intellectual property rights (IPRs), investment, government procurement and competition policy, etc.
- India has bilateral agreements with ASEAN, European Union, Sri Lanka, Singapore, Malaysia and Thailand.

- Article 1 of General Agreement on Tariffs and Trade (GATT) which enunciates the most favoured nation (MFN) principle of WTO states that "any advantage, favour, privilege, or immunity granted by any contracting party to any product originating in or destined for any other country shall be accorded immediately and unconditionally to the like product originating in or destined for the territories of all other contracting parties."
- This MFN principle is permitted for forming FTAs under some specific conditions as per the provisions of the WTO Agreements.

Proposed India-EU FTA:

- India-European Union (EU) FTA, officially known as the Broad-Based Trade and Investment Agreement is being negotiated for quite a while.
- However, in 2013, there was a breakdown in talks in between the two sides and the talks have been stalled ever since.
- The European Union wants India to reduce the import duties on alcohol and automobiles and India wants the EU to declare India as a 'data secure' country.

Conclusion:

- In regard with the FTAs, India should be very careful in the clauses of negotiation. Despite having a strong services sector in a select few categories, (IT, ITES, Healthcare and Education etc.) the agricultural sector as well as the industrial sector, especially the Micro, Small and Medium Scale Enterprises are still not as mature and strong as compared to the other countries with which India is negotiating FTAs.

Connecting the dots:

- What are free trade agreements? Discuss the benefits of free trade agreements.
- Critically analyse the free trade agreements signed by India?

[Eastern Economic Forum \(EEF\)](#)

Part of: GS Prelims and GS Mains II – International Organisations

In News

- Mr. Modi has been invited by Mr. Putin as the chief guest of the EEF to be held in Vladivostok (in Russia's Far East) on September 5.
- EEF is an **international forum** held each year, which was established by decree of the President Putin in 2015 to support the economic development of Russia's Far East
- The **Russian Far East** comprises the eastern Russian territory between **Lake Baikal in eastern Siberia** and the Pacific Ocean. This region **bordering China** is rich in mineral resources like diamonds, borax materials, gold, tungsten, fish and seafood
- In EEF, India and Russia are likely to seal a military logistics support agreement, the **Agreement on Reciprocal Logistics Support (ARLS)**,

- ARLS will facilitate access to each other's' military facilities for exchange of fuel and provisions on mutual agreement, **simplifying logistical support** and increasing operational turnaround.
- A pact may be signed where Russia will construct **six nuclear power plants** in India, apart from the six being set up in Kudankulam in Tamil Nadu.

Do you know?

- India signed the Logistics Exchange Memorandum of Understanding (LEMOA) with the U.S. in August 2016
- Russia has assured that it be delivering **the S-400 Triumph air defence missile system to India** by 2023 despite the US pressure on New Delhi not to acquire the system.
- America has threatened to impose sanctions on India (for S-400 defence deal) under the CAATSA (Countering America's Adversaries Through Sanctions Act) legislation



INDEPENDENCE DAY OFFER
AVAIL 15% OFF ON
REGISTERING NOW
OFFER VALID TILL AUG 31ST.



TLP CONNECT-2020

Mentorship based Programme (OFFLINE and ONLINE)

Features:

- TLP- Connect - Most Comprehensive Integrated Programme covering Prelims + Mains + Interview. It's an Incentive-based Programme, which runs in 3 phases. In Total 13 Months Programme.
 - Phase 1: October 2019 - May 2020 [8 Months] - Common to all students.
 - Phase 2: June 2020 - September 2020 [3 Months] - If you are clearing UPSC PRELIMS 2020, then 2nd Phase TLP Mains Mentorship will be completely **FREE!!**
 - Phase 3: Post Mains Results - Interview Mentorship Programme (IMP) - If you are clearing UPSC MAINS 2020, then 3rd Phase will be completely **FREE!!**
- Focus on Integration of Prelims and Mains preparation with a single Schedule.
 - 45 Prelims Tests (35 GS + 10 CSAT)
 - 30 Mains Tests
 - 12 Sectional - 12 Sectional Tests (Based on Basics, Conceptual Understanding + Analytical nature)
 - 2 Tests Exclusively on Ethics Case Studies
 - 8 Essay Tests (3 Tests only on Philosophical Essays, 3 only on Theme Based and 2 (Philosophical + Theme Based). in total, you will be writing 16 Essays.
 - 8 Comprehensive Mock Tests
- Babapedia: Prelimspedia + Mainspedia – One Stop Destination for Current Affairs.
- Discussion for both Offline and Online (Video) Students after every Mains Test
- Approach Paper and High Quality Synopsis prepared after extensive research and discussions among the Mentors for every test which acts as easy reference and revision.
- A dedicated Mentor to guide you through all stages of the exam. Available both Online (On Call) and Offline
- A few highly specialised sessions under the Series of Interactive Lectures (SOIL) to help you grow your analytical ability in areas like Essay and General Strategy, Ethics, International Relations, Internal Security among others will be taken by Founders and Toppers (on Pro-bono basis).
- Tests are flexible.
- Available both in Delhi and Bengaluru Centres.



Super 50– Scholarship Test: The entire programme will be completely **FREE** for Top 50 Students (both Online and Offline mode). For others, based on your performance you will be given a discount of 50%, 25%, 10%.



Why IASbaba?

- IASbaba's TLP Mains Hit Ratio – 80% (for 3 consecutive years)
- IASbaba's ILP, AIPTS (Prelims Test Series), 60 Day Plan Hit Ratio – 70% (for 3 consecutive years)
- 300+ Ranks from ILP and TLP Programme alone in the last 3 Years

BLORE CENTRE: #1443/1444, ABOVE
 CARZSPA, 80 FT. MAIN ROAD,
 GANAPATHI CIRCLE, CHANDRA
 LAYOUT, BENGALURU- 560040
 PH, NO.: 9035077800/ 7353177800

DELHI CENTRE:
 5B, PUSA ROAD, OPPOSITE TO METRO
 PILLAR 110, KAROL BAGH,
 NEW DELHI -110005
 PH. NO.:11-41678500/11-41672600

EMAIL: SUPPORT@IASBABA.COM
 WEBISTE: WWW.IASBABA.COM

INDIA AND THE WORLD

Fortifying the Africa outreach

Context:

- This week two important Indian dignitaries began their respective visits to Africa. President Ram Nath Kovind commenced his seven-day state visit to Benin, Gambia and Guinea-Conakry (July 28 to August 3) and Defence Minister Rajnath Singh arrived in Maputo on a three-day visit (July 28 to July 30) to Mozambique.

Concerns:

- There seems to be a conspicuous disconnect between Indian developmental assistance to and India's economic engagement with Africa

Economic ties of India and Africa:

- During the past five years, Indian leaders have paid 29 visits to African countries.
- Forty-one African leaders participated in the last India-Africa Forum Summit in 2015
- India agreed to provide concessional credit worth \$10 billion during the next five years.

Trade ties of India and Africa:

- By 2017, India had cumulatively extended 152 Lines of Credit worth \$8 billion to 44 African countries.
- India has also unilaterally provided free access to its market for the exports of 33 least developed African countries
- India escalated its commitments to Africa in an era of low-commodity prices when most other partners, including China, have scaled back theirs.
- India's trade with Africa totalled \$63.3 billion in 2018-19.
- India was ranked the third largest trading partner of Africa having edged past the United States during the year.

Issues in India and Africa Relations:

- India is neither a rich country nor has its hands been tainted by a history of slavery, colonisation and the exploitation of Africa.
- In fact, it is a developing country with similar domestic challenges of poverty, infrastructure deficit and underdevelopment.
- India's funds committed and seats in our prestigious academic institutions offered to Africa are at the expense of the tax-paying Indians.

- India's aid to Africa should be reciprocated by acknowledgement and quid pro quo in terms of goodwill (beyond the easy-flowing official rhetoric), and institutional preference.
- India cannot simply be a cash cow for Africa, particularly when its own economy is slowing down.

Steps to be considered by India:

1. we need to take direct control of our development programme instead of handing our funds to intermediaries such as the African Union, the African Development Bank Group and the Techno-Economic Approach for Africa-India Movement (TEAM 9), whose priorities are often different from India's
 - To make an impact, our aid should be disbursed bilaterally and aligned with national priorities of the recipient state, which should be a substantial stakeholder and co-investor in schemes and projects from initiation to operation.
2. India's development assistance should prefer the countries with its substantial interests, both existing and potential
 - For Example: Nigeria, South Africa, Egypt, Ghana, Angola and Algeria are India's top six trading partners in Africa, accounting for nearly two-thirds of its trade and half its exports to the continent;
 - yet, they do not figure commensurately in India's developmental pecking order.
 - India's own needs for raw materials, commodities and markets should be factored in its aid calculus
3. We ought to prefer aiding countries which are willing to help us — from access to their natural resources to using our generics.
4. The aided project selected should be compatible with local requirements. They should be cost-effective, scalable, future ready and commercially replicable.
5. For greater transparency, India should prefer its public sector to implement the aid projects.
6. The Indian Head of Mission in the recipient African state must be an integral part of the aid stream including project selection, co-ordination and implementation.
7. The aforementioned should not distract us from our duty to provide the needed humanitarian assistance to Africa to be rendered promptly and with sensitivity, but without noise.

Conclusion:

- There seems to be a conspicuous disconnect between Indian developmental assistance to and India's economic engagement with Africa.
- The time has now come to integrate these two axes for a more comprehensive and sustainable engagement.
- It would also facilitate aided pilot projects being scaled up seamlessly into commercially viable joint ventures.
- The simultaneity of the two visits may be a coincidence, but it also indicates enhanced priority to Africa. This should be welcomed.

Connecting the dots:

- What makes India and African relations Unique? Discuss how these relations help the Indian economy?

India-Bhutan

Part of: GS Prelims and Mains GS II – International relations

In News

- PM Modi during his recent visit to Bhutan has said that that **India and Bhutan** are “**natural partners**” in bringing prosperity to their peoples
- The two countries also signed 10 MoUs to expand their bilateral relationship and infuse new energy in their ties. Some of the key MoUs include:
- Inauguration of the **Mangdechhu hydroelectric power plant**. Most of the electricity generated by it will meet the energy requirements of Bhutan and the surplus electricity will be exported to India.
- Launch of **the RuPay Card** in Bhutan to further enhance bilateral relationship in digital payments, and trade and tourism.
- **Currency Swap limit increased:** additional \$100 million will be available to Bhutan under a standby swap arrangement to meet the foreign exchange requirement.
- **Space cooperation:** Inauguration the Ground Earth Station and SATCOM network, developed with assistance from ISRO for utilization of South Asia Satellite in Bhutan.
- MoU signed for interconnection between India’s National Knowledge Network and Bhutan’s Druk Research and Education Network.

India-Bahrain ties

Part of: GS Prelims and GS Mains II –International relations

In News

- PM Narendra Modi paid a state visit to Bahrain on 24-25 August 2019, which was the **first ever Prime Ministerial visit** from India to Bahrain.
- Both India & Bahrain called on global community to reject use of terrorism against other countries as both sides agreed to further enhance **cooperation in the field of security, counter-terrorism** and the exchange of intelligence and information
- They also said that regional connectivity projects should be based on international law, including respect for sovereignty and territorial integrity of states, in an apparent reference to **China’s BRI project**

- Both agreed to enhance cooperation to strengthen **maritime security in the Gulf region**, vital for the security and safety of sea lanes and **pressed for UN reforms**
- India also welcomed the interest of Bahrain to join the **International Solar alliance**.
- India also launched the **renovation of Shree Krishna temple** in Manama, the oldest in the Gulf region.
- An MoU was also signed between BENEFIT, a Bahrain company handling ATM and POS transactions among others, and National Payments Corporation of India (NPCI) for **launch of RuPay card in the Gulf Kingdom**.
- The two countries also signed MoUs on cultural exchange programme, space technology, solar energy

Do You Know?

- India-Bahrain bilateral **trade** has been on the rise for the last few years, reaching about **US\$ 1.3 billion** in 2018-19
- About **3.5 lakhs Indian national reside & work** in Bahrain, which is the largest expatriate community in Bahrain.
- The presence of over **3,000 Indian-owned/joint Ventures in Bahrain** indicates the intense economic engagement between the two countries
- **Gulf Cooperation Council**: is a regional intergovernmental political and economic union consisting **of all Arab states of the Persian Gulf except Iraq**, namely: Bahrain, Kuwait, Oman, Qatar, Saudi Arabia, and the United Arab Emirates

[Know India programme \(KIP\)](#)

Part of: GS Prelims and Mains GS I and II – Indian Society and Indian Diaspora

In News

- A group of Indian Origin youth have visited India under the 54th Edition of KIP, scheduled from 1st August to 25th August, 2019 in association with the partner states of Punjab and Haryana
- KIP is a 25-day orientation programme organized by the **Ministry of External Affairs** in partnership with the states of India.
- The objective of the programme is to make Indian diaspora (aged between 18-30 years) aware about India, its cultural heritage, art and to promote awareness about the progress made by India in various fields such as Industry, Education, ICT, Climate and Power & Renewable Energy etc.
- Since 2004, the Ministry has conducted 53 editions of KIP with participation of 1821 Overseas Indian youth.
- In 2016, the scheme was revamped to increase duration from 21 to 25 days, with a 10-day visit to one or two States and preference given to PIOs from Giritiya countries.
- Since 2016, six KIPs are being organised in a year.
- A maximum of 40 Indian Diaspora youth are selected for each programme and provided full hospitality in India.

Do You Know?

- “**Girmitiyas**” or Indentured Labourers, is the name given the Indians who left Indian in the middle and late 19th Century to serve as labourers in the British colonies, where the majority eventually settled.
- **Mauritius, Fiji, Suriname, Guyana, Trinidad & Tobago** are known as Girmitiya Countries.

[Letting the pearl on the Silk Road shine brighter](#)**Context:**

- The Dunhuang city has been witness to multiple interactions and mutual learning between China and India
- Recently, Chinese President Xi Jinping visited the Mogao Grottoes in Dunhuang city of China to inspect cultural relics protection and research work.

About Dunhuang:

- Dunhuang is a land that has gone through vicissitudes of history with ancient legacies and magic beauty.
- Around 2,000 years ago, a Chinese geographer of the Eastern Han dynasty Ying Shao said: “Dun, means grand; Huang, means splendid.”Therefore Dunhuang means the land of grand splendour.
- Historical changes over the millennium shaped the magnificent landscape of this frontier region west of China’s Gansu province and left colourful and gorgeous cultural treasures.
- The Mogao Grottoes, located in a desert oasis surrounded by water and mountain, have stood quietly for over 1,650 years and become the most abundant and exquisite Buddhist art relics in China and beyond.
- Mogao Grottoes are a treasure house of art, architecture, sculpture and painting with 735 grottoes, over 45,000 square meters of murals and 2,000 painted sculptures.
- These works of art are exquisitely crafted, with unique craftsmanship, vivid charm, and combination of form and spirit. Like an amazing and colourful movement, they tell a beautiful and touching legend of magic charm lasting thousand years.
- Dunhuang is a witness to interactions and mutual learning between China and India, two ancient civilisations. The Mogao Grottoes in Dunhuang remind me of Ajanta Caves and Elora Caves in India.
- All being world-famous, the murals and Buddha figures in these caves tell the historical and cultural ties between Chinese and Indian civilisations, and witness the light of inter-civilisational exchanges and mutual learning.
- Indian-style sculptures can be seen in the Mogao Grottoes built during the 4th to 6th centuries.

- The moves of the most commonly seen Apsara figure in Dunhuang murals are similar to those in Indian classical dances. Dunhuang also keeps many ancient Buddhist sutras written in Sanskrit and Pattra-Leaf Scripture, a wealth of information for China-India cultural exchanges

Convergence of cultures

- Dunhuang is a classical example of convergence of Oriental and Western civilisations.
- Dunhuang is an important hub where Oriental culture met the Western culture in history, and different cultures met and mingled here, shaping the unique charm of Dunhuang culture.
- The rich and colourful painted sculptures and murals in the Mogao Grottoes absorb the strength of ancient Eastern and Western art.
- The splendid Dunhuang culture is a fusion of the best of cultures of various nations.
- Ji Xianlin, a master scholar on culture in China, said that there are **only four cultural systems in the world** with long history, vast territory, self-contained system and far-reaching influence
 - Chinese
 - Indian
 - Greek and
 - Islamic

Dunhuang as an important hub city:

- Dunhuang is known as the “Pearl on the Silk Road”.
- For thousands of years, envoys and officials, merchants and caravans, monks and scholars, capital and technology, integrated and communicated through this silk road, nourishing the development and prosperity of countries along the route
- China and India have also developed close economic, trade and cultural exchanges along the ancient Silk Road of both land and sea.
- China’s paper making, silk, porcelain and tea were introduced to India, while Indian singing and dancing, astronomy, architecture and spices were introduced to China, which became the historical witness of the mutual exchanges between the two sides.
- Zhang Qian was sent on a diplomatic mission to the Western Regions. Zheng He sailed to the Western Ocean seven times and visited India six times.
- Xuan Zang, Kumarajiva, Bodhidharma and other great monks made the expeditions by crossing over mountains and sailing the deep sea

Road of friendship-India and China

- The Silk Road is not only a road of trade, but also a road of friendship and mutual learning among civilisations.
- It will certainly further promote the deep inter-connectivity and cultural exchanges between countries along the route.
- The Silk Road spirit is about openness, exchanges and inclusiveness. It reveals the truth that there will be no progress without openness, no development without exchanges and no strength without inclusiveness.

People-to-People (P2P) meeting:

- The mechanism was set up under the joint initiative of President Xi Jinping and Prime Minister Narendra Modi.
- Chinese State Councilor and Foreign Minister Wang Yi and Indian Minister of External Affairs Subrahmanyam Jaishankar co-chaired the second meeting of China-India High Level People-to-People (P2P) and Cultural Exchanges Mechanism in Beijing
- Since the first meeting, bilateral people-to-people and cultural exchanges and cooperation have seen a fresh boom.
- At this meeting, China and India agree to host more colourful P2P and cultural events, work for new progress in P2P and cultural exchanges and consolidate the popular support for the sound development of China-India relations.

Conclusion:

- In the long course of history, China and India, two ancient oriental civilisations, have engaged in exchanges and mutual learning, created two vigorous and charming civilisations, and made great contributions to the development of human civilisation. In the new era, China and India should also adhere to inclusiveness and resolve differences through building common ground. We should transcend civilisation barriers through exchanges, rise above “civilisation conflicts” by mutual learning, and overcome the sense of superiority by promoting coexistence of civilisations

Connecting the dots:

- Discuss Indo-China cultural relations.

India-G7

Part of: GS Prelims and GS Mains II –International relations

In News

- The 45th edition of G7 Summit is currently being held in France. The host country typically gets to invite dignitaries from outside the G7 to attend the Summit
- PM Modi was invited to attend the G7 Summit as a special guest of French President Emmanuel Macron
- The G7 or ‘Group of Seven’ are Canada, France, Germany, Italy, Japan, the United Kingdom, and the United States.
- It is an **intergovernmental organisation** that was **formed in 1975** by the top economies of the time as an **informal forum** to discuss pressing world issues.
- The Group was initially formed as an effort by the US and its allies to discuss economic issues, which in the **late 1970s** included battling a **global oil crisis**

- Since then, the scope of G7 discussion has enlarged to include financial crises, economic changeover of ex-Soviet bloc nations, terrorism, arms control, and drug trafficking, among others.
- The G7 does **not** have a **formal constitution** or a **fixed headquarters**. The decisions taken by leaders during annual Summits are **non-binding**.
- The rise of India, China, and Brazil over the past few decades has reduced **the G7's** relevance, whose **share in global GDP has now fallen to around 40%**

Do You Know?

- 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.
- The G20 is a larger group of countries, which also includes G7 members. The G20 was formed in 1999, in response to a felt need to bring more countries on board to address global economic concerns
- Apart from the G7 countries, the G20 comprises Argentina, Australia, Brazil, China, India, Indonesia, Mexico, Russia, Saudi Arabia, South Africa, South Korea, and Turkey.
- **India is slated to host a G20 summit in 2022.**



INDEPENDENCE DAY OFFER
AVAIL 15% OFF ON
REGISTERING NOW
OFFER VALID TILL AUG 31ST.



TLP PLUS~2020

EXCLUSIVE MAINS MENTORSHIP PROGRAMME (ONLINE AND OFFLINE)

Features:

- **30 Mains Tests (Most Practical Planning)**
 - 12 Sectional - 12 Sectional Tests (Based on Basics, Conceptual Understanding + Analytical nature)
 - 2 Tests Exclusively on Ethics Case Studies
 - 8 Essay Tests (3 Tests only on Philosophical Essays, 3 only on Theme Based and 2 (Philosophical + Theme Based). In total, you will be writing 16 Essays.
 - 8 Comprehensive Mock Tests
- **Discussion** for both Offline and Online (Video) Students after every Mains Test.
- A few highly specialised sessions under the **Series of Interactive Lectures (SOIL)** to help you grow your analytical ability in areas like Essay and General Strategy, Ethics, International Relations, Internal Security among others will be taken by Founders and Toppers (on Pro-bono basis).
- **Approach Paper** and High Quality **Synopsis** prepared after extensive research and discussions among the Mentors for every test which acts as easy reference and revision.
- Highly trained and Dedicated **Mentor's** to give feedback on the answers, clarify the doubts, tips to improve the quality and structuring of answers and regular motivation. Available both **Online (On Call)** and **Offline**.
- Tests are **flexible**.
- Available both in **Delhi and Bengaluru Centres**.



Why IASbaba?

- IASbaba's TLP Mains Hit Ratio – 80% (for 3 consecutive years)
- IASbaba's ILP, AIPTS (Prelims Test Series), 60 Day Plan Hit Ratio – 70% (for 3 consecutive years)
- 300+ Ranks from ILP and TLP Programme alone in the last 3 Years

BLORE CENTRE: # 1443/1444,
 ABOVE CARZSPA, 80 FT. MAIN ROAD,
 GANAPATHI CIRCLE, CHANDRA
 LAYOUT, BENGALURU- 560040
 PH. NO.: 9035077800/ 7353177800

DELHI CENTRE:
 5B, PUSA ROAD, OPPOSITE TO METRO
 PILLAR 110, KAROL BAGH,
 NEW DELHI - 110005
 PH. NO.: 11-41678500/11-41672600

EMAIL: SUPPORT@IASBABA.COM
 WEBISTE: WWW.IASBABA.COM

ECONOMY

Equalization Levy

Part of: GS Prelims and Mains GS III- Indian economy and Government Budgeting

In News

- Domestic SMEs and start-ups have written to centre complaining about the equalisation levy as foreign companies continue to invoice Indian start-ups and SMEs from their overseas office.
- The equalisation levy, introduced in 2016, is a **direct tax** on payments made by residents to non-resident companies for online advertisement, provision of digital and advertising space or any other facility or service for online advertisement.
- Indian start-ups and SMEs are required to deposit **6% equalisation levy** (TDS) on behalf of these foreign companies which leads to additional compliance and cost burden on these firms
- Since this is a levy, these firms are **unable to claim Input Tax Credit** for this cost incurred
- In order to rectify this, the start-ups have requested the government to mandate that “any global corporation having sales and marketing operations in India must be required to invoice their customers in India from a registered entity in India.”

Do you know?

- Market for online ads on which a 6% equalization levy is applied is up from ₹9,800 crore in FY18 to ₹11,870 crore till February 2019
- The idea behind the equalization levy is to tax services of digital service providers in foreign markets which has customer base in India

Micro- Small and Medium Enterprises (MSMEs)

Context:

- The low rate of greenfield investment could reflect poor demand for credit and supply-side problems among NBFCs

What are MSMEs

- Micro- Small and Medium Enterprises (MSMEs) are small sized entities, defined in terms of their size of investment.
- They are contributing significantly to output, employment export etc. in the economy.
- They perform a critical role in the economy by providing employment to a large number of unskilled and semi-skilled people, contributing to exports, raising manufacturing sector production and extending support to bigger industries by supplying raw material, basic goods, finished parts and components, etc.

How MSMEs are classified?

The MSMEs are classified in terms of investment made in plant and machineries if they are operating in the manufacturing sector and investment in equipment for service sector companies.

Though the primary responsibility of promotion and development of MSMEs is of the State Governments, the center has passed an Act in 2006 to empower the sector and also has formed a Ministry (Ministry of MSMEs).

| Manufacturing sector | |
|----------------------|---|
| Enterprises | Investment in plant & machinery |
| Micro Enterprises | Does not exceed twenty five lakh rupees |
| Small Enterprises | More than twenty five lakh rupees but does not exceed five crore rupees |
| Medium Enterprises | More than five crore rupees but does not exceed ten crore rupees |

| Service sector | |
|--------------------|--|
| Enterprises | Investment in equipments |
| Micro Enterprises | Does not exceed ten lakh rupees: |
| Small Enterprises | More than ten lakh rupees but does not exceed two crore rupees |
| Medium Enterprises | More than two crore rupees but does not exceed five crore rupees |

New Classification:

- A micro enterprise will be defined as a unit where the annual turnover does not exceed five crore rupees;
- A small enterprise will be defined as a unit where the annual turnover is more than five crore rupees but does not exceed Rs 75 crore;
- A medium enterprise will be defined as a unit where the annual turnover is more than 75 crore rupees but does not exceed Rs 250 crore.
- Additionally, the Central Government may, by notification, vary turnover limits, which shall not exceed thrice the limits specified in Section 7 of the MSMED Act.

Organizational structure

- The primary responsibility of promotion and development of MSMEs is of the State Governments

- The role of the Ministry of MSME and its organisations is to assist the States in their efforts to encourage entrepreneurship, employment and livelihood opportunities and enhance the competitiveness of MSMEs
- The Ministry of MSME consists of Small & Medium Enterprises (SME) Division, Agro & Rural Industry (ARI) Division, Integrated Finance (IF) Wing and Data Analytics and Technical Coordination (DATC) Wing, the Office of the Development Commissioner (DCMSME) and other attached organizations.

What is the potential of India's MSME sector?

- Micro, Small and Medium Enterprises (MSMEs) play a vital role in the growth of Indian economy by contributing 45% of industrial output, 40% of exports.
- It employs 60 million people, creates 1.3 million jobs every year and produces more than 8000 quality products for the Indian and international markets.
- There are approximately 30 million MSME Units in India and 12 million persons are expected to join the workforce in the next 3 years.

Importance of MSME in India:

- **It creates large-scale employment:** Enterprises that are inclusive in this sector require low capital to start up new business. Moreover, it creates a vast opportunity for the unemployed people to avail. India produces about 1.2 million graduates per year out of which the total number of engineers are around 0.8 million. There is no economy so far that could provide that large number of freshers in one year only. MSME is the boon for the fresh talent in India.
- **Economic stability in terms of Growth and leverage Exports:** It is the most significant driver in India contributing to the tune of 8% to GDP. Considering the contribution of MSME to manufacturing, exports, and employment, other sectors are also benefitting from it. Nowadays, MNCs are buying semi-finished, and auxiliary products from small enterprises,
- **Encourages Inclusive Growth:** The inclusive growth is at the top of the agenda of Ministry for Medium, and small and Medium-sized enterprises for several years. On the other hand, poverty and deprivation are a deterrent to the development of India. Besides, it includes marginalized sections of a society which is a key challenge lying before the Ministry of MSME.
- **Cheap Labor and minimum overhead:** While in the large-scale organizations, one of the main challenge is to retain the human resource through an effective human resource management professional manager. But, when it comes to MSME, the requirement of labor is less and it does not need a highly skilled laborer. Therefore, the indirect expenses incurred by the owner is also low.
- **Simple Management Structure for Enterprises:** MSME can start with limited resources within the control of the owner. From this decision making gets easy and efficient. On the contrary, a large corporation requires a specialist for every departmental functioning as it has a complex organizational structure. Whereas a small enterprise does not need to hire an external specialist for its management. The owner can manage himself. Hence, it could run single-handedly.
- **The main role in the mission of "Make in India":** The signature initiative by the Prime Minister of India "Make in India" has been made easy with MSME. It is taken as a backbone in making this dream a possibility. In addition, the government has directed the financial institution to lend more credit to enterprises in the MSME sector.

The list of the problems that are faced by existing/new companies in SME sector are as under:

- Absence of adequate and timely banking finance
- Limited capital and knowledge
- Non-availability of suitable technology
- Low production capacity
- Ineffective marketing strategy
- Constraints on modernisation & expansions
- Non availability of skilled labour at affordable cost
- Follow up with various government agencies to resolve problems due to lack of man power and knowledge etc

The problem of low investment in MSMEs and what we can do

Structural problems retarding growth in pre-existing MSMEs:

- The Economic survey is more about the structural problems retarding growth in pre-existing MSMEs rather than the immediate problem, which is the lack of fresh investment.
- The chapter 3 of Economic survey provides evidence that firms in India, whether they start out above or below the 100 worker line, do not grow as much over time as they do elsewhere because of these restrictions
- One of the many reasons why the generalized fear of being laid off from a job is particularly intense in India is because, until recently, pensions under the Employees' Provident Fund Organisation (EPFO) often died with the job, since the EPFO number was not portable.

An age-related sunset clause to downsizing flexibility (as recommended by the ES) could switch off investment in MSME:

- A start below the downsizing threshold, despite the scale economies of being bigger, could be because of high downside risk to demand projections, which would vary by sector.
- Then there is also a spatial dimension to the issue. Investment within agglomerations is less risky than stand-alone units in a provincial location
- Provincial MSME startups may be especially sensitive to an age-related sunset to downsizing flexibility.
- there are multiple thresholds that a small, young firm may not wish to cross. The goods and services tax (GST) has added another threshold, defined in terms of turnover, below which compliance is less burdensome.
- All these thresholds would have to carry age-related sunset clauses for the incentive to work, but the most likely impact would be to discourage MSME startups altogether.

On the supply of credit:

Since banks have to now move in where NBFCs fear to tread, there could be process delays resulting from difficulties in due diligence, especially for locations spatially removed from major urban centres.

Steps taken by the Government:

- **Credit Guarantee Trust Fund for Micro & Small Enterprises (CGTMSE):** Ministry of MSME and Small Industries Development Bank of India (SIDBI), established a Trust named Credit Guarantee

Fund Trust for Micro and Small Enterprises (CGTMSE) to implement Credit Guarantee Fund Scheme for Micro and Small Enterprises and provide financial assistance to MSMEs.

- **A Scheme for Promoting Innovation, Rural Industry & Entrepreneurship (ASPIRE):** It aims to set up a network of technology centers, incubation centres to accelerate entrepreneurship and also to promote start-ups for innovation and entrepreneurship in rural and agriculture based industry
- **Micro & Small Enterprises Cluster Development (MSE-CDP):** It aims to support the sustainability and growth of MSEs by addressing common issues such as improvement of technology, skills and quality, market access, access to capital, etc.
- **National Manufacturing Competitiveness Programme:** The objective is to develop global competitiveness among Indian MSMEs. This programme targets at enhancing the entire value chain of the MSME sector.
- **SFURTI-SI (Scheme of Fund for Regeneration of Traditional Industries, Credit Guarantee Scheme):** The scheme aims to organize the traditional industries and artisans into clusters to make them competitive and provide support for their long term sustainability and economy of scale
- **Technology Centre Systems Programme (TCSP):** Under this programme, technology centres have been developed for giving technical education and support to MSMEs
- **MUDRA (Micro Units Development & Refinance Agency Ltd.):** The establishment of the MUDRA (Micro Units Development & Refinance Agency Ltd.) bank under the Pradhan Mantri MUDRA Yojana has been a major initiative. The Bank gives loans for working capital and additional requirements to income generating small business activity in manufacturing, processing, services or trading.
- **Credit Linked Capital Subsidy Scheme (CLCSS):** CLCSS aims at facilitating technology upgradation of Micro and Small Enterprises (MSEs) by providing 15% capital subsidy (limited to maximum Rs.15 lakhs) for purchase of Plant & Machinery.
- **Prime Minister's Employment Generation Programme (PMEGP):** The major objective is to generate employment opportunities in rural as well as urban areas of the country through setting up of new self-employment ventures/ projects/ micro enterprises.
- **Udyog Aadhaar Memorandum (UAM):** It is a simple one-page registration form aimed at easing out registration process.
- **MSME SAMADHAAN:** The Ministry of MSME launched a portal samadhaan.msme.gov.in. to facilitates MSEs to file their delayed payments related complaints online.
- **Market assistance Scheme:** It aims to help MSMEs to participate domestic and international exhibitions/trade fairs etc.

Conclusion:

- MSME is the backbone of the Indian economy. This sector has proven the instrumental in the growth of the nation, leverage exports, creating huge employment opportunities for the unskilled, fresh graduates, and the underemployed.

- It also extended the opportunities to banks for giving more credit to enterprises to MSME Sector.
- The government should take the special care by addressing the importance of MSME in terms of providing more and more MSME Registration advantages by implementing better regulations and enable financial institutions to lend more credit at less interest rate for sustainability of this sector.

Connecting the dots:

1. Analyse the challenges that make Indian manufacturing less competitive globally? How can India ensure a greater share in global GDP from manufacturing?
2. Do you think the micro, small and medium industries hold the key to India's industrial growth? Examine.

[Explaining the Asian rate cuts wave](#)

Content:

- Policy makers across Asia should ensure enough ammunition to manage a prolonged economic downturn

Concerns:

- The latest International Monetary Fund (IMF)-World Economic Outlook update in July 2019 has confirmed a growing belief that global growth has decelerated and dark clouds seem to be looming in the near term.
- Specifically, the IMF has downgraded global growth multiple times since October 2018 and now projects it to be 3.2% compared to 3.6% in 2018.

The China Factor

- China is one of the few major economies that is expected to continue to decelerate into 2020 (along with Japan which is faced with acutely unfavourable demographics and seems unable to escape persistent deflationary pressures).
- The country has faced strong headwinds to growth both because of the ongoing supply-side reforms, including dealing with financial risks (reining in of shadow banking and hidden debt of local governments), as well as the negative effects of escalating tariffs and their consequent impact on its exports and investment.
- While there have been some short-term beneficiaries of the export and trade diversion from China to countries such as Vietnam, the global external demand slowdown has more than outweighed these gains.

Asian banks to the rescue

- In response to the global economic slowdown as well as generally subdued inflationary pressures, many Asian central banks (India, China, Indonesia, Malaysia, the Philippines, South Korea) have begun to ease monetary policy.
- The recent wave of rate cuts in Asia is consistent with research which suggests that emerging economies tend to be cautious about lowering interest rates
- when the base country (usually the U.S.) does not do so as they are concerned about potential capital flight and sharp currency depreciations which in turn could have negative repercussions on domestic firms and other entities with unhedged external borrowings in foreign currencies.
- However, when interest rates in the base country decline, while emerging economies may experience massive surges in capital inflows if they stand pat on interest rates, they can maintain monetary policy autonomy via a combination of sterilised foreign exchange intervention (leading to sustained reserve accumulation) as well as tightening of capital controls and/or use of macro prudential policies (MaPs)
- Alternatively, if the emerging economies are themselves faced with an economic slowdown, they are comfortable lowering their interest rates along with the base country, as is the case currently in Asia.
- This said, it is wise for Asian policy makers to ensure that they have enough ammunition to manage a prolonged downturn given that 2020 is “precarious” with many downside risks

Where does all of this leave India?

- On the one hand, since India has not been well-integrated with the Asian and global supply chains, it has not been as impacted directly by the China-U.S. trade war.
- On the other hand, given existing acute domestic bottlenecks, policy missteps and ongoing structural challenges, India has not been able to reap significant benefits as an alternative production and export platform to China.
- On the back of a prolonged downturn in the capex cycle, the IMF has downgraded projected growth for India to 7% in 2019.
- This is broadly in line with the forecasted range by the Reserve Bank of India (RBI). While this growth is admirable relative to other major countries, it is well below the country’s likely potential growth of 7.5% and 8%.

The concerns here however have been threefold.

1. Despite the rapid interest rate cuts, India’s real interest rates are still higher than most other countries, though it remains unclear what the neutral real interest rate consistent with India’s potential output actually is.
2. More than most other countries in the region, an ongoing concern for India is that interest rate policy transmission to bank rates tends to be rather slow and limited. This is likely due to a combination of factors:
 - a. The banking system has been faced with a deterioration in asset quality and remains saddled with bad debts.
 - b. There has been and anaemic deposit growth.
 - c. There is limited scope to reduce deposit rates.

3. Despite the interest rate cuts, India's real effective exchange rate (REER) has actually appreciated somewhat (around 7%) since October 2018, consistent with the fact that real interest rates have not declined

Way forward:

- If India is to succeed in its ambition of becoming a \$5-trillion economy by 2024-25, there can be no substitute for undertaking the necessary structural reforms needed to jump-start private investments and longer-term growth.
- However, in the short term, in all likelihood, monetary policy will have to remain accommodative (more so than what it is currently) and much greater attention will be needed to be paid on how to revive public capex without raising the cost of capital further.
- In the face of constraints in raising revenues in a slowing economy, the government's preferred solution seems to be to issue overseas sovereign bonds rather than streamline subsidies and revenue expenditures.
- The proposed \$10 billion sovereign issuance is manageable vis-à-vis the countries stock of forex reserves, while India's sovereign external debt (as share of GDP) is modest at present.
- However, increases in external borrowings add an additional element of risk to the economy.
- Such a move also likely complicates monetary policy further, as any adverse exchange rate movements will lead to a ballooning of interest payments on government debt which is already eating up around a quarter of budgetary spending. It is not clear that the current policy mix is ideal for India.

Connecting the dots:

- Critically examine the reasons for slowdown in the global economy with special reference to US and China.

RBI's monetary policy

Context

- In its monetary policy review, the Monetary Policy Committee of the RBI decided to cut the repo rate by 35 basis points (bps)
- The RBI's repo rate has now fallen 110 basis points since February. The RBI also announced some measures to boost economic activity.

What is monetary policy?

- Monetary policy refers to the policy of the central bank i.e., Reserve Bank of India, in matters of interest rates, money supply and availability of credit.
- It is through the monetary policy, RBI controls inflation in the country.
- Monetary policy refers to the use of monetary instruments under the control of the central bank to regulate magnitudes such as interest rates, money supply and availability of credit with a view to achieving the ultimate objective of economic policy.

- RBI uses various monetary instruments like REPO rate, Reverse RERO rate, SLR, CRR etc to achieve its purpose.

Objectives or Goals of Monetary Policy:

The following are the principal objectives of monetary policy:

1. Full Employment:

- Full employment has been ranked among the foremost objectives of monetary policy. It is an important goal not only because unemployment leads to wastage of potential output, but also because of the loss of social standing and self-respect.

2. Price Stability:

- One of the policy objectives of monetary policy is to stabilise the price level. Both economists and laymen favour this policy because fluctuations in prices bring uncertainty and instability to the economy.

3. Economic Growth:

- One of the most important objectives of monetary policy in recent years has been the rapid economic growth of an economy. Economic growth is defined as “the process whereby the real per capita income of a country increases over a long period of time.”

4. Balance of Payments:

- Another objective of monetary policy since the 1950s has been to maintain equilibrium in the balance of payments.

5. Restriction of Inventories:

- Overfilling of stocks and products becoming outdated due to excess of stock often results in sickness of the unit. To avoid this problem the central monetary authority carries out this essential function of restricting the inventories. The main objective of this policy is to avoid over-stocking and idle money in the organization

6. Promotion of Exports and Food Procurement Operations:

- Monetary policy pays special attention in order to boost exports and facilitate the trade. It is an independent objective of monetary policy.

7. Reducing the Rigidity:

- RBI tries to bring about the flexibilities in the operations which provide a considerable autonomy. It encourages more competitive environment and diversification. It maintains its control over financial system whenever and wherever necessary to maintain the discipline and prudence in operations of the financial system.

Instruments of Monetary Policy:

- The instruments of monetary policy are of two types: first, quantitative, general or indirect (CRR, SLR, Open market operations, bank rate, repo rate, reverse repo rate); and second, qualitative, selective or direct. (change in the margin money, direct action, moral suasion)
- They affect the level of aggregate demand through the supply of money, cost of money and availability of credit.
- Of the two types of instruments, the first category includes bank rate variations, open market operations and changing reserve requirements.
- They are meant to regulate the overall level of credit in the economy through commercial banks.

Monetary Policy Committee (MPC)

- Now in India, the policy interest rate required to achieve the inflation target is decided by the Monetary Policy Committee (MPC). MPC is a six-member committee constituted by the Central Government (Section 45ZB of the amended RBI Act, 1934).
- The MPC is required to meet at least four times in a year. The quorum for the meeting of the MPC is four members. Each member of the MPC has one vote, and in the event of an equality of votes, the Governor has a second or casting vote.
- The resolution adopted by the MPC is published after the conclusion of every meeting of the MPC. Once in every six months, the Reserve Bank is required to publish a document called the Monetary Policy Report to explain:

(1) The sources of inflation and

(2) The forecast of inflation for 6-18 months ahead.

- The 6 member Monetary Policy Committee (MPC) constituted by the Central Government as per the Section 45ZB of the amended RBI Act, 1934. The first meeting of the Monetary Policy Committee (MPC) was held on in Mumbai on October 3, 2016.
- The composition of the MPC as on April 2019 is as follows;
 - Governor of the Reserve Bank of India – Chairperson, ex officio;
 - Deputy Governor of the Reserve Bank of India, in charge of Monetary Policy.
One officer of the Reserve Bank of India to be nominated by the Central Board
 - Dr. Ravindra H. Dholakia, Professor, Indian Institute of Management, Ahmedabad – Member
 - Professor Pami Dua, Director, Delhi School of Economics – Member
 - Shri Chetan Ghate, Professor, Indian Statistical Institute (ISI) – Member

Why does monetary policy matter?

- In any economy, economic activity, which is measured by gross domestic product or GDP, happens by one of four ways.
 - One, private individuals and households spend money on consumption.
 - Two, the government spends on its agenda.
 - Three, private sector businesses “invest” in their productive capacity.

- Four, the net exports — which is the difference between what all of them spend on imports as against what they earn from exports.
- Monetary policy essentially answers that question. In every country, the central bank is mandated to decide the cost of money, which is more commonly known as the “interest rate” in the economy.
- While various factors make it difficult for a central bank to exactly dictate interest rates, as a thumb rule, RBI’s decision on the repo rate sets the markers for the rest of the economy.

What is the repo rate?

- Repo and Reverse repo are short for repurchase agreements between the RBI and the commercial banks in the economy. In essence, the repo rate is the interest rate that the RBI charges a commercial bank when it borrows money from the RBI. As such, if the repo falls, all interest rates in the economy should fall.

But the interest rate for consumer loans has not reduced by 110 bps since February. Why?

- In the real world, the “transmission” of an interest rate cut (or increase) is not a hundred per cent. And that is why, even though when the RBI cut by 35 bps on Wednesday, lay consumers may only receive a much lower reduction in the interest rate on their borrowings. This is due to a lot of factors — but primarily, it has to do with the health of the concerned commercial bank.
- Over the past few years, almost all banks, especially the ones in the public sector, have seen their profits plummet because many of their past loans have turned out to be non-performing assets (in other words, they are not getting repaid).
- To cover for these losses, the banks have to use their existing funds, which would have otherwise gone to common consumers for fresh loans.
- There is another key element that affects the banks’ decision.
- The reduced repo rate applies only to new borrowings of banks.
- The banks’ cost of existing funds is higher. Of course, funding costs would eventually come down — but this process would take time. This “lag” in monetary policy is a key variable in determining the efficacy of any rate cut by the RBI.
- It could take anywhere between 9 and 18 months for the full effect of an RBI decision to reflect in interest rates across the economy.

So, how does RBI decide the interest rate?

- Any central bank has a few main concerns:
- The first is to ensure price stability in the economy. The interest rate anchors the prices in an economy. The RBI continuously maps prices, inflation (which is the rate of increase in prices), and expectations of inflation (of households) to decide if it should increase or decrease interest rates.
- The other related concern for a central bank is to take care of economic growth. For instance, economic growth is anaemic at present and partly as a consequence, the inflation rate has been below 4% for several months now. The RBI is, therefore, cutting interest rates to incentivise people to consume more and businesses to invest more.

Will the rate cut bring investments?

- Investments depend essentially on the “real” interest rate.
- The real interest rate is the difference between the repo rate and retail inflation.
- When making an investment decision, it is this interest rate that matters. As a variable, it allows an investor to compare the attractiveness of different economies.

Conclusion:

- So it can be concluded that the implementation of the monetary policy plays a very prominent role in the development of a country. It's a kind of double edge sword, if money is not available in the market as the requirement of the economy, the investors will suffer (investment will decline in the economy) and on the other hand if the money is supplied more than its requirement then the poor section of the country will suffer because the prices of essential commodities will start rising.

Connecting the dots:

1. What is the purpose of setting up a Monetary policy committee (MPC)? What are its objectives? What is its present composition? Discuss.
2. The ongoing slowdown is cyclical and not structural in nature. Elucidate

Economic milestone and a poignant anniversary**CONTEXT:**

- Bank nationalisation eased rural credit and aided financial inclusion. Any move to reverse it would be self-defeating

Nationalisation of Banks:

- The nationalisation of banks in 1969 was a watershed moment in the history of Indian banking.
- From July 19 that year, 14 private banks were nationalised; another six private banks were nationalised in 1980.
- It is certain that one cannot locate a similar transformational moment in the banking policy of any country at any point of time in history.

Banking system at the time of independence:

- India's rural financial system was marked by the domination of landlords, traders and moneylenders.
- In 1951, if a rural household had an outstanding debt of Rs. 100, about Rs. 93 came from non-institutional sources.

- From the 1950s, there were sporadic efforts to expand the reach of the institutional sector, particularly in the rural areas.
- Despite these measures, the predominantly private banking system failed to meet the credit needs of the rural areas.

India's banking policy after 1969

- As a part of a new branch licensing policy, banks were told that for every branch they opened in a metropolitan or port area, four new branches had to be opened in unbanked rural areas. As a result, the number of rural bank branches increased from 1,833 (in 1969) to 35,206 (in 1991)
- The concept of priority-sector lending was introduced. All banks had to compulsorily set aside 40% of their net bank credit for agriculture, micro and small enterprises, housing, education and "weaker" sections.
- A differential interest rate scheme was introduced in 1974. Here, loans were provided at a low interest rate to the weakest among the weakest sections of the society.
- The Lead Bank scheme was introduced in 1969. Each district was assigned to one bank, where they acted as "pace-setters" in providing integrated banking facilities
- The Regional Rural Banks (RRB) were established in 1975 to enlarge the supply of institutional credit to the rural areas
- The National Bank for Agriculture and Rural Development (NABARD) was constituted in 1982 to regulate and supervise the functions of cooperative banks and RRBs.
- The share of institutional sources in the outstanding debt of rural households increased from just 16.9% in 1962 to 64% in 1992.

Growth spurring

- India's nationalisation experience is an answer to mainstream economists who argue that administered interest rates cause "financial repression".
- According to this view, if the government administers interest rates, the savings rate would decline, leading to a rationing of investment funds.
- On the contrary, India's nationalisation led to an impressive growth of financial intermediation.
- The share of bank deposits to GDP rose from 13% in 1969 to 38% in 1991.
- The gross savings rate rose from 12.8% in 1969 to 21.7% in 1990.
- The share of advances to GDP rose from 10% in 1969 to 25% in 1991.
- The gross investment rate rose from 13.9% in 1969 to 24.1% in 1990.
- Nationalisation also demonstrated the utility of monetary policy in furthering redistributionist goals
- India's nationalisation shows that monetary policy, banks and interest rates can be effectively used to take banks to rural areas, backward regions and under-served sectors, furthering redistributionist goals in an economy.

Arguments in favour of financial liberalisation

- The Narasimham Committee of 1991 recommended that monetary policy should be divorced from redistributionist goals.
- Instead, banks should be free to practise commercial modes of operation, with profitability as the primary goal
- The Reserve Bank of India allowed banks to open and close branches as they desired.
- Priority sector guidelines were diluted; banks were allowed to lend to activities that were remotely connected with agriculture or to big corporates in agri-business, yet classify them as agricultural loans. Interest rate regulations on priority sector advances were removed.

The outcomes:

- More than 900 rural bank branches closed down across the country.
- The rate of growth of agricultural credit fell sharply from around 7% per annum in the 1980s to about 2% per annum in the 1990s.
- This retreat of public banks wreaked havoc on the rural financial market.
- Between 1991 and 2002, the share of institutional sources in the total outstanding debt of rural households fell from 64% to 57.1%.

A to and fro**The government and the RBI probably saw the danger coming in banking policy****Following measures were taken:**

- In 2004, a policy to double the flow of agricultural credit within three years was announced. Only public banks could make this happen.
- In 2005, the RBI quietly brought in a new branch authorisation policy. Permission for new branches began to be given only if the RBI was satisfied that the banks concerned had a plan to adequately serve underbanked areas and ensure actual credit flow to agriculture.
- In 2011, the RBI further tightened this procedure. It was mandated that at least 25% of new branches were to be compulsorily located in unbanked centres.

Outcome of these initiatives:

- The number of rural bank branches rose from 30,646 in 2005, to 33,967 in 2011 and 48,536 in 2015.
- The annual growth rate of real agricultural credit rose from about 2% in the 1990s to about 18% between 2001 and 2015.
- Much of this new provision of agricultural credit did not go to farmers; it largely went to big agri-business firms and corporate houses located in urban and metropolitan centres — but recorded in the bank books as “agricultural credit
- public banks also played a central role in furthering the financial inclusion agendas of successive governments.

- Data show that more than 90% of the new no-frills accounts were opened in public banks

Conclusion:

- The macroeconomic policy framework of successive governments has hardly been supportive of a banking structure dominated by public banks.
- In times of slow growth, the excess liquidity in banks was seen as a substitute for counter-cyclical fiscal policy.
- Successive governments, scared of higher fiscal deficits, encouraged public banks to lend more for retail and personal loans, high-risk infrastructural sectors and vehicle loans.
- Consequently, banks are in crisis with rising non-performing assets.
- The same fear of fiscal deficits is also scaring the government away from recapitalising banks.
- The solution put forward is a perverse one: privatisation. The goose that lays golden eggs is being killed.

Connecting the dots:

1. Indian banks need to resolve their NPA issues at the earliest to boost the economy for further development. What are the measures taken by concerned stakeholders to address the issue?
2. Discuss the impact of Nationalisation of banks

Global recession

Context:

- Researchers at Morgan Stanley have alerted that if US and China continue to heap increasing tariff and non-tariff barriers over the next four to six months, the world economy could enter a recession within the next three quarter.
- The last massive downward spiral in the global economy happened in the wake of the great financial crisis of 2008 and continued till 2010.

What is a global recession?

- In an economy, a recession happens when output declines for two successive quarters (that is, six months).
- However, for a global recession, institutions such as the International Monetary Fund tend to look at more than just a weakness in the economic growth rate; instead, they look at a widespread impact in terms of the impact on employment or demand for oil etc.
- The long-term global growth average is 3.5 per cent. The recession threshold is 2.5 per cent.

What has triggered the alarm?

- On August 1, trade tensions between the two biggest economies of the world escalated further when the US announced that it would impose 10 per cent tariff on imports from China. These measures are to come in to effect on September 1.
- In retaliation, China threatened to take countermeasures. The US has also declared China a “**currency manipulator**”.
- In other words, the US accuses China of deliberately weakening the yuan to make Chinese exports to the US more attractive and undercut the effect of increased tariffs that the US is employing.
- The renewed trade tensions threaten to derail the already struggling global economy.
- For instance, the global manufacturing Purchasing Managers’ Index and new orders sub-index have contracted for the second consecutive month in July; they are already at a seven-year low. Further, the global capital expenditure cycle has “ground to a halt”; since that start of 2018, there’s been a sharp fall-off in nominal capital goods imports growth.
- Central banks around the world are cutting interest rate in a bid to shore up global economic activity. To some extent, that cheap money policy is countering the adverse impacts of trade wars and all-round global uncertainty, thanks to Brexit and geopolitical tensions in West Asia, and between the US and North Korea.

How do higher tariffs affect growth?

- According to Morgan Stanley, two-thirds of the goods being lined up for increased tariffs are consumer goods.
- Higher tariffs are not only likely to douse demand but, most crucially, hit business confidence.
- The apprehension is that the latest US tariffs and similar countermeasures by China could start a negative cycle wherein businesses do not feel confident to invest more, given the lower demand for consumer goods.
- Reduced capital investment would reflect in fewer jobs, which, in turn, will show up in reduced wages and eventually lower aggregate demand in the world.

Conclusion:

- What makes this scenario tricky is that fact that monetary policy is already loose. Ideally, the global economy should not risk reaching a recession at a time when the monetary levers may not have a lot to offer. In fact, at present, the trade tensions and uncertainty is negating the positives that a cheap money policy could provide to the world economy.

Connecting the dots:

- Discuss the global recession and its impact on various sectors of Indian economy

[Repo-linked deposit and lending rates](#)

Part of: GS Prelims and Mains GS II- Indian Economy

In News

- Public sectors banks(PSB) SBI, Syndicate Bank, Bank of India, Union Bank and Allahabad Bank have announced to link their deposits and loans to the repo rate.
- The RBI has been looking at various ways in which banks can be made to **transmit repo rate cuts to** depositors and borrowers.
- Given that banks source only about 1 per cent of their funds from RBI's repo window and the bulk of deposits from the public, PSBs used to complain that they cannot slash their lending rates unless their deposit rates also reduced.
- Curbing inflation or stimulating growth by raising or lowering the repo rate is the key objective of monetary policy.
- However, hikes or reductions in the repo rate by India's **Monetary Policy Committee** have had only a marginal impact on the economy because of the partial transmission of these cuts by banks.
- This action of PSBs linking savings account interest rates to the repo rate partly solves this problem of transmission of rate cuts by RBI
- Using an external benchmark like the repo rate makes the **process more transparent** to retail borrowers and depositors.
- On the flip side, both savings bank account and loan rates will swing with the repo rate making it **volatile**.
- **Concern:** SBI, for instance, applies it only to depositors who have a balance of over Rs 1 lakh in their savings accounts. This make up less than 10% of its deposit base and is bound to lead to partial transmission.

Do You know?

- Repo Rate is the rate at which the RBI lends money to commercial banks
- Decrease in deposit rate will discourage people to deposit their savings in bank deposits and instead adopt informal channels like gold.
- Decrease in lending rate will boost credit uptake and increase the investment & production activity in an economy.

[Regulatory sandbox](#)

Part of: GS Prelims and Mains GS III- Economy

In News

- The Reserve Bank of India (**RBI**) issued the final framework for regulatory sandbox
- A regulatory sandbox usually refers to **live testing of new products or services** in a controlled/test regulatory environment for which regulators may permit certain regulatory **relaxations** for the limited purpose of the testing.
- The objective of the sandbox was to **foster responsible innovation in financial services**, promote efficiency and bring benefit to consumers.

- RBI will launch the sandbox for entities that meet the criteria of minimum net worth of ₹25 lakh as per their latest audited balance sheet
- The entity should either be a company incorporated and registered in the country or banks licensed to operate in India.
- While money transfer services, digital know-your customer, financial inclusion and cybersecurity products are included, crypto currency, credit registry and credit information have been left out.

Corporate Social Responsibility (CSR)

Part of: GS Prelims and Mains GS-III – Indian Economy

In News

- Centre had recently amended the Company Law to make CSR spend mandatory for companies. It also stipulated that non-compliance could be treated as a criminal offence and attract penalties.
- A High-Level Committee CSR constituted in Sep 2018 under the chairmanship of **Injeti Srinivas** to **review the existing framework on CSR** has submitted its report
- Some of its recommendations include
 - **CSR spends should be eligible for tax deduction** under the income tax law. Currently, income tax law does not allow CSR spends as tax deductible amount.
 - Allowing the **carry-forward of unspent balance** for a period of 3-5 years
 - **Aligning** Schedule 7 of the Companies Act (which outlines the kinds of activities that qualify as CSR) with the **UN Sustainable Development Goals**.
 - Companies having CSR-prescribed amount below ₹50 lakh may be exempted from constituting a CSR Committee
 - Violation of CSR compliance may be made a **civil offence** and shifted to the penalty regime.
 - Introducing **impact assessment studies** for CSR obligations of ₹5 crore
 - **Registration of implementation agencies** on the Ministry of Corporate Affairs portal

Geographical indication and its benefits

Context:

- Geographical indication can boost agriculture exports

Concern:

- The key concern is the value of agri-imports has surged by four percentage points, touching an all-time high of \$25 billion in FY18, which can possibly surpass the value of agri-exports, thus making India a net agri-importer.

Geographical indication:

- An initiative India should take is branding agri-products through steps such as geographical indication (GI), especially for organically-produced commodities that would realise higher returns in global markets.
- Establishing effective agricultural brands can help farmers gain a competitive advantage in 'buyer-driven' global markets.
- Some globally recognised brands (California almonds, Chilean wines, Swiss chocolates) enjoy a high stature in their respective product groups. Branded items usually fetch better price and can lead to brand loyalty, and are seen as a move towards a strong customer base. Branding adds value by differentiating the product and also because of the consumer perception that such products are of superior quality than unbranded ones

What is Geographical Indication?

- Geographical Indication is a genre of Intellectual Property.
- GI tag is an insignia on products having a unique geographical origin and evolution over centuries with regards to its special quality or reputation attributes.
- The status to the products marks its authenticity and ensures that registered authorised users are allowed to use the popular product name.
- These could be naturally grown crops like Assam Chilies or manufactured products like Jaipur Pottery.
- GI tags are given on the basis of the Geographical Indications of Goods (Registration and Protection) Act, 1999.
- The registration of GI is valid for 10 years after which it needs to be renewed.
- Violation of GI tags is punishable offence under law.

What are the benefits of a GI Tag?

- Legal protection to the products
- Prevents unauthorised use of a GI tag products by others
- Helps consumers to get quality products of desired traits
- Promotes economic prosperity of producers of GI tag goods by enhancing their demand in national and international markets.
- The GI tag allows the producers of the objects to claim a premium for their products. Thus, it is financially beneficial to them.
- The GI tag can also pique interest of consumers and thus raise demand for a product again benefiting the producer.

What are the legalities related to GI Tag?

- It is covered as an element of intellectual property rights (IPRs) under the Paris Convention for the Protection of Industrial Property.
- At international level, GI is governed by World Trade Organisation's (WTO's) Agreement on Trade-Related Aspects of Intellectual Property Rights (TRIPS).

- In India, GI registration is governed by the Geographical Indications of goods (Registration and Protection) Act, 1999.
- This Act is administered by Controller General of Patents, Designs and Trade Marks, who is also Registrar of Geographical Indications and is based in Chennai, Tamil Nadu.

India and GI Tag:

- India has about 300 registered GIs, but few have been used for commercial value addition. Two of India's well-known GIs are Darjeeling tea and Basmati rice, but both seem to be minuscule in terms of market impact when compared with, say, Chilean wine or Danish cheese.
- While a programme to promote branding and commercialisation of GI products for exports has been initiated in the Directorate General of Foreign Trade policies during 2015-20, it is pertinent to take it to the next level.

What lessons can also be learnt from other countries in promoting brands:

- Many countries have opted for clustering, which is at the root of branding agricultural commodities and adding value to products.
- For example, France started this for wine, and soon after many other countries followed—Japan for Kobe beef, Colombia for Juan Valdez coffee and New Zealand for Manuka honey.
- A celebrated example is that of Malaysia for having implemented commodity branding programme called Malaysia's Best. It is an umbrella brand for selected horticultural products that guarantee quality and safety in accordance with Malaysian standards and good agricultural practices.
- Aggressive branding of agri-products is that government support, if given, would be WTO-compliant as it is placed under the 'green box' instead of 'amber box'.
- Currently, India supports agri-exporters through duty drawback and under the Merchandise Export from India Scheme, which may carry the risk of being WTO non-compliant.
- It goes without saying that adequate budgetary allocations towards aggressive branding and packaging can encourage producers and exporters.

Conclusion:

- An initiative India should take is branding agri-products through steps such as geographical indication.
- An increased thrust on agricultural exports is well documented in the Agriculture Export Policy 2018, and is also visible through alterations in the tariffs and non-tariffs measures.

Connecting the dots:

1. Discuss the benefits and problems of GI tag?
2. How geographical indication can boost agriculture exports. Explain?

Geographical indication (GI)

Part of: GS Prelims

In News

- The Geographical Indication (GI) under the Department for Promotion of Industry and Internal Trade has recently registered 4 new GIs.
- **Palani Panchamirtham:**
 - Palani Panchamirtham, an abishega Prasadam, is one of the main offerings for the presiding deity of Arulmigu Dhandayuthapaniswamy Temple, situated in palani Hills in Dindigul District of Tamil Nadu.
 - It is a combination of five natural substances, namely, banana, jaggery sugar, cow ghee, honey and cardamom in a definite proportion.
 - This is the **first time a temple 'prasadam' from Tamil Nadu** has been bestowed with the GI tag.
- **Tawlhlohpuan:**
 - Tawlhlohpuan is a medium to heavy, compactly woven, good quality fabric from **Mizoram**.
 - It is known for warp yarns, warping, weaving & intricate designs that are made by hand.
 - Tawlhloh, in Mizo language, means 'to stand firm or not to move backward'
- **Mizo Puanchei:**
 - Mizo Puanchei is a colourful Mizo shawl/textile, from **Mizoram**.
 - It is an essential possession for every Mizo lady and an important marriage outfit in the state. It is also the most commonly used costume in Mizo festive dances
 - The weavers insert the designs and motifs by using supplementary yarns while weaving to create this textile
- **Tirur Betel leaf:**
 - Tirur betel mainly cultivated in Malappuram District of **Kerala**, is valued both for its mild stimulant action and medicinal properties.
 - Even though it is commonly used for making pan masala for chewing, it has many medicinal, industrial and cultural usages.

Direct Tax Code 2.0

Part of: GS Prelims and GS Mains III – Economy

In News

- The Task force headed by **Akhilesh Ranjan** submitted its Direct tax code (DTC) report to Finance Minister
- In order to review the Income-tax Act, 1961 and to draft a new direct tax law in consonance with the economic needs of the country, a Task Force was constituted by the Government in November, 2017.
- Proposed DTC to have far **fewer sections** than over 700 in the Income Tax Act

- Addressing disruption caused by the US tax reforms last year, the panel has pressed for a **corporate tax** cut for domestic and foreign firms to **25 per cent**. Presently it is 30 per cent for large companies and 40 per cent for foreign firms.
- However, foreign firms may have to pay **branch profits tax** on the amount repatriated to their foreign partner.
- The panel has recommended **Dividend distribution tax** may be done away with.
- The task force suggested replacing the concept of assessing officer with assessment units, besides **faceless scrutiny of cases** picked through centrally and randomly allotted mechanism.
- Aimed at reducing tax litigation, it proposes a new concept of settling disputes through **mediation** between the taxpayer and a collegium of officers.

Do You know?

- The US had cut the rate from 35 per cent to 21 per cent last year
- FM in 2019-20 Union budget had cut corporate tax for firms with an annual turnover of up to Rs 400 crore to 25 per cent from 30 per cent, covering 99.3 per cent companies.
- Large companies (turnover larger than Rs 400 Crore) continue to be taxed at 30% along with surcharges & cess.

Bonds, yields, and inversions

As talk of a recession gets louder globally, bond yields are being keenly watched. A government bond yield curve most accurately reflects what investors think about current and future economic growth prospects.

What are bonds?

- A bond is an instrument to borrow money. It is like an IOU.
- A bond could be floated/issued by a country's government or by a company to raise funds. Since government bonds (referred to as G-secs in India, Treasury in the US, and Gilts in the UK) come with the sovereign's guarantee, they are considered one of the safest investments.
- As a result, they also give the lowest returns on investment (or yield). Investments in corporate bonds tend to be riskier because the chances of failure (and, therefore, the chances of the company not repaying the loan) are higher.

What are bonds yields?

- Simply put, the yield of a bond is the effective rate of return that it earns. But the rate of return is not fixed — it changes with the price of the bond.
- But to understand that, one must first understand how bonds are structured. Every bond has a face value and a coupon payment. There is also the price of the bond, which may or may not be equal to the face value of the bond.

What is happening to US govt bond yields at present? What does it signify?

- The global economy has been slowing down for the better part of the last two years. Some of the biggest economies are either growing at a slower rate (such as the US and China) or actually contracting (such as Germany).
- As a result, last week, US Treasury bond yields fell sharply as there was confirmation of slowdown in Germany and China.
- Reason: investors, both inside the US and outside, figured that if growth prospects are plummeting, it makes little sense to invest in stocks or even riskier assets. It made more sense rather, to invest in something that was both safe and liquid (that is, something that can be converted in to cash quickly). US Treasury bonds are the safest bet in this regard. So, many investors lined up to buy US Treasury bonds, which led to their prices going up, and their yields falling sharply.
- The fall in the yields of 10-year government bonds showed that the bond investors expected the demand for money in the future to fall. That is why future interest rates are likely to be lower.
- A lower demand for money in the future, in turn, will happen only when growth falters further.
- So government bond yields falling typically suggest that economic participants “expect” growth to slow down in the future.

And what is a yield curve, and what does it signify?

- A yield curve is a graphical representation of yields for bonds (with an equal credit rating) over different time horizons. Typically, the term is used for government bonds — which come with the same sovereign guarantee. So the yield curve for US treasuries shows how yields change when the tenure (or the time for which one lends to the government) changes.
- If bond investors expect the US economy to grow normally, then they would expect to be rewarded more (that is, get more yield) when they lend for a longer period. This gives rise to a normal — upward sloping — yield curve

What then is yield inversion, and what does it mean?

- Yield inversion happens when the yield on a longer tenure bond becomes less than the yield for a shorter tenure bond. This, too, happened last week when the 10-year Treasury yield fell below the 2-year Treasury yield.
- A yield inversion typically portends a recession. An inverted yield curve shows that investors expect the future growth to fall sharply; in other words, the demand for money would be much lower than what it is today and hence the yields are also lower.

How good is yield inversion at predicting a recession?

- Although US Commerce Secretary Wilbur Ross was quoted as saying Monday that “eventually there’ll be a recession but this inversion is not as reliable, in my view, as people think”, yet US data show historically that barring one episode in the mid-1960s, a yield inversion has always been followed by a recession.

Connecting the dots:

- What are bond yields? Why are bond yields tumbling around the world? How rising bond yields will impact the savings?

New FPI norms by SBI

Context:

- SEBI has relaxed the FPI norms to check the outflows of FPIs from India. SEBI relaxes Foreign Portfolio Investors (FPI) norms by easing the regulatory framework for FPI with simplifies KYC requirements for them and allow FPIs to carry out an off-market transfer of securities. Apart from this SEBI classified FPIs into two categories instead of three. SEBI relaxes the norms on the basis of a committee headed by H R Khan (Former RBI Deputy Governor).

Who are Foreign Portfolio Investors?

- FPI are those investors who hold a short term view of a company, unlike Foreign Direct Investors who invest with a long term view. They participate in the stock markets in the economy. FPI doesn't have direct control over the businesses. FPIs are easier to sell than the FDIs due to high liquidity. Generally, the FPI route is preferred for laundering black money. In India, FPIs are regulated by SEBI.

Need of Committee:

- Both the FPIs and the investors had serious concern over the SEBI norms and want to review the norms by SEBI. FPIs shows concern over that the FPIs norms will result in restrictions on investments however SEBI dismissed any such fears. Accordingly, SEBI constitutes H R Khan Committee to review FPI norms and concern raised by the investors.

Recommendation of H R Khan Committee:

- The committee categorized the recommendation into four buckets i.e. FPI Registration process, KYC and documentation, Investment permission and limits and other aspects.
- The committee recommends that OCIs, NRIs, and RIs should be allowed for holding a non-controlling stake in FPIs and no restrictions should be imposed on them for managing non-investing FPIs or SEBI registered offshore funds.
- The committee recommends for easing KYC requirements for beneficial owners in case of government-related FPIs.
- The committee recommended that erstwhile PIOs should not be subjected to any restrictions and clubbing of investment limits should be allowed for well regulated and publicly held FPIs that have common control.
- The committee also suggests that the time for compliance with the new norms should be extended by six months after the finalization and the non-compliant investors should be given another 180 days to reconcile their existing positions.
- According to the committee, NRI will be allowed to invest as FPIs if the single holding is under 25% and group holding under 50% in a fund.
- The panel also recommends that the new rules should be equally applied to the investors using participatory notes (P-notes).

- The panel also suggested for changes in the norms pertaining to the identification of senior managing officials of FPIs and for beneficial owners of listed entities.

New FPI norms by SEBI:

- SEBI rationalizes the requirements for issuance and subscription of offshore derivative instruments (ODIs).
- SEBI said that the offshore funds floated by the mutual funds would be allowed to invest in the country after the registration.
- Those entities which are established under the International Financial Services Centre must meet the criteria for FPIs.
- SEBI permits FPIs for off-market transfer of securities which are unlisted, suspended or illiquid to a domestic or foreign investor.
- Structure for Multiple Investment Manager also has been simplified.
- Those central banks who are not the members of Bank for International Settlements would be eligible for registration as FPIs to attract more overseas funds to the market.
- The FPIs are classified into two categories earlier it was two.
- SEBI said it would rationalize the framework for issuance of participatory notes (P-notes)
- The board also clarified on the debt to equity ratio, companies need to maintain it as 2:1 to be eligible for buybacks however the Non-banking financial companies (NBFC) arms would be exempt from the rule.
- To crack down insider trading a new whistleblower mechanism will be implemented.
- Rewarding informants up to Rs. 1 crore for providing “credible and original information” on insider trading.
- Mutual funds are now allowed to invest in unlisted non-convertible debentures.

Reasons for Outflow of FPIs from India:

India is the fastest-growing country in the world and there are certain issues which stress the overall economic performance of the country.

One of the main challenges recently is the outflow of FPIs from India. Reasons for the outflow of FPIs are:

- Introducing Higher tax surcharge in the Budget 2019 by the government.
- Continue Depreciation of Indian Rupee
- The trade war between the U.S and China
- Reduced rating and default of NBFCs
- Rising of crude oil prices

Differences between FPI and FDI

- FPI lets investor purchase stocks, bonds or other financial assets in foreign country.
- In this case, investor does not actively manage investments or companies that issue investment.
- It also does not have control over securities or business.
- In contrast, FDI lets investor purchase direct business interest in foreign country.

- The investor also controls his monetary investments and actively manages company into which he puts money.
- FPI is more liquid and less risky than FDI.

Conclusion:

- Easing of FPI norms could give a boost to the overseas investment in the country which is an important source of economic growth and development in India. These changed norms will make the regulatory framework more investor-friendly for FPIs and a multidimensional approach is needed to resolve the concerns of FPIs and reasons of outflows.

[Nirmala Sitharaman's measures to revive economic growth](#)

Context:

The announcements come at a time when the perception that the slowdown has been aggravating in recent weeks and spreading across sectors.

Finance Minister Nirmala Sitharaman Friday announced a partial rollback of the enhanced surcharge on foreign portfolio investors (FPI) levied in the Budget and indicated a review of the surcharge levy for high net worth individuals as well.

Announcements made by finance minister:

- Surcharge on long and short term capital gains arising from transfer of equity shares has been withdrawn
- The CSR violation would be treated as a civil offence, and not a criminal offence.
- Apart from these two measures, the FM announced a slew of measures aimed at boosting a flagging domestic economy.
- This includes an assertion that ICE (internal combustion engine) vehicles will coexist with EVs (electric vehicles) and that there is no phasing out of ICE vehicles, a fear expressed in certain quarters of the auto industry.
- Banks would also be asked to pass on the full impact of the interest rate cuts to consumers
- Repo rate-linked loans
 - The Finance Minister did not restrict her efforts to boost the economy to just the private sector. In what should be welcomed by borrowers across the board, including those looking for home and auto loans, she announced that public sector banks have decided to increase their repo rate-linked loan offerings.
 - A major complaint among end-consumers has been that the Reserve Bank of India's repo rate cuts have not been transmitted onwards by the banks. Repo rate-linked loan products will effectively take the banks out of the rate-setting process.
 - What should also cheer prospective homeowners is that the government has announced an additional ₹20,000 crore of liquidity to the housing finance companies, over and above the ₹10,000 crore earlier announced.

What is the surcharge that's been withdrawn?

- The surcharge of 3 per cent and 7 per cent on those earning between Rs 2 crore and Rs 5 crore, and over Rs 5 crore respectively had been announced by Sitharaman as part of her Budget proposals.
- This had led to different taxation outcomes for FPIs registered as Association of Persons or trusts and companies, even as those registered as companies were spared of this surcharge.
- Ever since the budget announcement, markets have been seeing a selloff on most trading days, largely in light of the FPI impact.
- Today's announcement reverses the levy imposed in the budget. However, tax experts said the surcharge would continue to be levied on business income of the FPIs and unlisted shares.

Why was the CSR announcement controversial?

- The amendment to the Companies Act, passed earlier this month, introduced harsh penalties including jail term for non-compliance on CSR (corporate social responsibility) by listed companies.
- This had been slammed by industry as a regressive move, especially given the fact that in the last five years, the total CSR spend of companies has progressively jumped from 70% to over 90% now, according to data sourced from Prime Database.

Why have these decisions been taken now?

- Over the last few weeks, the Finance Minister had chaired a series of meeting with the industry leaders, bank representatives, ministry officials and PSU chiefs to discuss the issues impacting the economy.
- Last week, she had also held a review meeting with the Prime Minister on the state of the economy.
- The announcements come at a time when the perception that the slowdown has been aggravating in recent weeks and spreading across sectors.
- The ongoing slowdown is not specific to India and is a global issue, Sitharaman said at the media interaction.

Conclusion:

- For an economy that is downbeat in growth and in sentiment, the comprehensive package of measures announced by Finance Minister Nirmala Sitharaman on Friday may just be the right boost. They address growth slowdown concerns; free up funds for investment and spending by banks, housing finance companies and MSMEs; and importantly, undo some controversial proposals, in the budget and outside it, which were affecting sentiment in the markets and the corporate sector. And, importantly, these have all been done without any significant financial burden on the government. Some of the measures promote the ease of doing business and even the ease of living for ordinary citizens.

Connecting the dots:

- Critically examine the reasons for slowdown in the Indian economy

RBI transfer surplus to government of India

Context:

- The Central Board of the Reserve Bank of India (RBI) decided to transfer a sum of ₹1,76,051 (\$24.4 billion) crore to the Government of India (Government) comprising of ₹1,23,414 crore of surplus for the year 2018-19 and ₹52,637 crore of excess provisions identified as per the revised Economic Capital Framework (ECF).

To understand what the transfer is, we must first understand where the funds come from. The central bank has three different funds that together comprise its reserves. These are the

- Currency and Gold Revaluation Account (CGRA), largest and makes up the significant bulk of the RBI's reserves.
- The Contingency Fund (CF) and
- The Asset Development Fund (ADF).

Why Government wanted it?

- The government has argued that relatively lower transfers cramped public spending for infrastructure projects and social sector programmes, considering the pressure to meet deficit targets and to provide space for private firms to borrow.

How does the RBI generate surplus?

- A significant part comes from RBI's operations in financial markets, when it intervenes for instance to buy or sell foreign exchange;
- Open Market operations, when it attempts to prevent the rupee from appreciating;
- As income from government securities it holds;
- As returns from its foreign currency assets that are investments in the bonds of foreign central banks or top-rated securities;
- From deposits with other central banks or the Bank for International Settlement or BIS; besides lending to banks for very short tenures and management commission on handling the borrowings of state governments and the central government.
- RBI buys these financial assets against its fixed liabilities such as currency held by the public and deposits issued to commercial banks on which it does not pay interest.

What can the government do with this huge surplus?

- The money is transferred to the Consolidated Fund of India from which salaries and pensions to government employees are paid and interest payments done, besides spending on government programmes.
- The large payout can help the government cut back on planned borrowings and keep interest rates relatively low.
- Besides, it will provide space for private companies to raise money from markets.
- And if it manages to meet its revenue targets, the windfall gain can lead to a lower fiscal deficit.

- The other option is to earmark these funds for public spending or specific projects, which could lead to a revival in demand in certain sectors and boost economic activity.

What did the Jalan Committee recommend?

- The Jalan Committee, as it was called informally, is actually called the Expert Committee to Review the RBI's Extant Economic Capital Framework.
- The committee recommended that the RBI maintain a Contingent Risk Buffer — which mostly comes from the CF — of between 5.5-6.5% of the central bank's balance sheet.
- Since the latest CF amount was about 6.8% of the RBI's balance sheet, the excess amount was to be transferred to the government.
- The committee also decided, for the year under consideration, to use the lower limit of 5.5% of the range it recommended.
- So, basically, whatever was excess of 5.5% of the RBI's assets in the CF was to be transferred. That amount was ₹52,637 crore.
- Regarding the RBI's economic capital levels — which is essentially the CGRA — the committee recommended keeping them in the range of 20-24.5% of the balance sheet.
- Since it stood at 23.3% as of June 2019, the committee felt that there was no need to add more to it, and so the full net income of the RBI — a whopping ₹1,23,414 crore — should be transferred to the Centre.
- That ₹1.23 lakh crore plus the ₹52,637 crore is what comprises the ₹1.76 lakh crore that the RBI has decided to transfer to the government.
- It must be noted that this ₹1.76 lakh crore includes the ₹28,000 crore interim dividend earlier transferred to the Centre and does not come over and above it.
- Recommendation on a profit distribution policy has been endorsed by the Central Board meaning a more transparent and rule-based payout from next year, as in many other central banks, which could help narrow differences between the government and RBI.

Conclusion:

- The bottom line however remains unchanged. India's economy has weakened in the last few years. To reverse this trend, government needs to unleash a new round of reforms which encompass factors of production such as land, labour and capital.

Connecting the dots:

- Why RBI's surplus corpus transfer raises more questions? Discuss

[Foreign Direct Investment\(FDI\)](#)

Part of: GS Prelims and GS Mains III – Economy

In News

- In an effort to get economic growth government has liberalised FDI rules in various sectors
- **Digital media:** Government approved **FDI up to 26%** under the “government route” for digital media companies that upload or stream news and current affairs.
- Digital news media was **unregulated** & thriving with 100% FDI was allowed in such start ups.
- **Coal mining:** Government permitted **100% FDI under automatic route** for sale of coal, for coal mining activities including associated processing infrastructure
- This will result in FDI inflow along with updated technology, and increase India’s coal production thus reducing coal imports. It will also enhance Coal India Limited’s (CIL) competitiveness and efficiency.
- **Contract Manufacturing:** Government has decided to allow 100% FDI under automatic route in contract manufacturing in India.
- **Single Brand Retail Trading (SBRT):** All procurements made from India by the SBRT entity for the single brand shall be counted towards local sourcing, irrespective of whether the goods procured are sold in India or exported.

Do You know?

- Print media and news broadcast television companies in India have had FDI caps of 26% and 49% respectively.
- In India, it takes at **least six years** from getting a mine allocation to actually starting mining operations.
- In 2018-19 India spent about \$8 billion on **importing 125 million tonnes of coal** for non-coastal thermal plants.
- State-owned Coal India and Singareni Collieries Company together accounted for **91.6% of the total coal produced** in the country during FY2017-18
- Total **FDI flows into India in 2018-19** i.e. US \$ **64.37 billion** (provisional figure) is the highest ever FDI received for any financial year.

New FDI Norms

Context:

- The Centre’s announcement on Foreign Direct Investment (FDI) norms on Wednesday appears to be one more push to make India a more attractive destination to overseas investors, especially those keen on entering the market for the long haul.

Concerns:

- The government, clearly concerned by the economic slowdown and persistently weak investment activity, has sought to provide a policy fillip to attract more foreign capital into sectors that it sees as having a multiplier effect particularly in terms of job creation

New Rules:

- It has provided for a relaxation of the contentious sourcing norms which have been a major deterrent for foreign investment in single-brand retail.

- Firms can adjust their entire procurement from India, be it for their domestic operations or for global markets, against their local sourcing requirements.
- Local sourcing norms need not be met annually, but as an average of the first five years.
- Sourcing, even through group companies or indirectly through third parties such as contract manufacturers, will now be counted towards their domestic sourcing obligations
- Single brand retailers have also been allowed the option of setting up their online retail platforms before putting in place a brick and mortar presence.
- The government has allowed 100 per cent FDI in contract manufacturing and in coal mining and related activities such as washery, handling and separation.

How are the new rules significant?

- Easing of restrictions on foreign investment, which sends a positive signal to the international community
- So far, India has not been able to take advantage of this ongoing relocation of production facilities out of China. But, these changes in the rules should gradually facilitate foreign firms setting up manufacturing bases in India, providing a boost to both employment and exports.
- Allowing 100 per cent FDI in contract manufacturing through the automatic route will also attract global players looking to set up alternate manufacturing hubs — diversifying away from China.
- Adding exports to the local sourcing norms is also likely to encourage the building of larger production facilities, providing a much needed fillip to the country's subdued exports.
- These initiatives are an attempt to create a manufacturing ecosystem, establishing value chains with both upstream and downstream linkages
- Sectors such as electronics, mobiles, apparel and pharma are likely to benefit the most from these measures. And with India's electronics imports exceeding \$50 billion in 2018-19 — it was the biggest driver of the trade deficit after oil — over time, these measures could also help contain India's current account deficit.

Concerns of New Rules:

- For instance, the tweaks to investment norms on coal appear at first flush to be a win-win for both the economy at large and the coal industry, the environmental costs of focusing on one of the most polluting fossil fuels notwithstanding.
- This is predicated on the prospect of seeing an influx of both capital and modern technology into mining and processing, as well as raising domestic supply of the key raw material for power, steel and cement production thereby cutting costly and burgeoning imports.
- But for foreign mining companies to make a beeline to pitheads, several related regulatory and market challenges will have to be addressed post-haste

Conclusion:

- All these initiatives need to be accompanied by reforms, especially factor market reforms, that address the structural issues plaguing the economy.

- The continuing overvaluation of the rupee also needs to be attended to. In the coming weeks, the government is likely to announce more measures to tackle the slowdown. These should be at the top of its agenda.

Connecting the dots:

1. How does the foreign investment in India affect India's economic growth? Critically evaluate in reference to major FDI policy decisions taken recently.

Mergers of Public sector banks(PSB)

Part of: GS Prelims and Mains GS-III - Economy

In News

- Government announced mega bank amalgamation plan that **merged 10 PSBs into four larger entities**
- Banks have been merged on the basis of likely operating efficiencies, better usage of equity, geographical synergies and their technological platform
- There are four new sets of mergers
 - **Punjab National Bank**, Oriental Bank of Commerce and United Bank of India to merge to form the **country's second-largest lender**. These three banks are technologically compatible as they use Finacle Core Banking Solution platform.
 - Canara Bank and Syndicate Bank to amalgamate;
 - Union Bank of India to acquire Andhra Bank and Corporation Bank;
 - Indian Bank (Strong presence in South India) to merge with Allahabad Bank (strong presence in East & North India) – To maximise geographical synergies.
- Government also announced to **infuse 55,250 crore** in these banks to enable them to grow their loan book
- The government also unveiled **governance reforms in PSB**, providing their boards greater autonomy, flexibility to fix sitting fee of independent directors, longer term to directors at management committee of boards etc.

Do You Know?

- Out of the 10 banks that the government has decided to merge to create four, nine have net non-performing assets (NPAs) of over 5%.
- Government had merged Dena Bank and Vijaya Bank with Bank of Baroda on January 2019, creating the third-largest bank by loans in the country.
- With these series of mergers, **the number of state-owned banks is down to 12 from 27.**
- **Narasimham Committee of 1998** had proposed a three-tier banking structure for India - Three large banks of international size, eight to 10 national banks and a large number of regional banks.

| BANKING ON MERGERS | | Source: Union Finance Ministry | | |
|---------------------------|----------------------|--------------------------------|---------------------|----------------|
| Post-merger metrics | Punjab National Bank | Canara Bank | Union Bank of India | Indian Bank |
| | OBC [^] | Syndicate Bank | Andhra Bank | Allahabad Bank |
| | United Bank of India | | Corporation Bank | |
| Rank | 2 | 4 | 5 | 7 |
| Number of branches* | 11,437 | 10,342 | 9,609 | 6,104 |
| Business (₹crore) | 17,94,526 | 15,20,295 | 14,59,434 | 8,07,859 |
| Net NPA ratio (%) | 6.61 | 5.62 | 6.3 | 4.39 |
| Number of employees | 1,00,649 | 89,885 | 75,384 | 42,814 |

*Domestic | ^ Oriental Bank of Commerce

(Data as per March 2019 financials)

https://www.thehindu.com/business/5vg8pr/article29302645.ece/alternates/FREE_615/REV-Banking-on-mergerscol

The public sector bank merger

Context:

- The Centre Friday announced a mega amalgamation plan, the third in a row, that merged ten public sector banks into four larger entities, alongside board level governance reforms aimed at improving their financial health and enhancing their lending capacity to support growth.

The public sector bank merger

- The merger announcement was followed by an equity infusion move of Rs 55,250 crore in these banks to enable them to grow their loan book. With these series of mergers, the number of state-owned banks is down to 12 from 27.

There are four new sets of mergers —

- Punjab National Bank, Oriental Bank of Commerce and United Bank of India to merge to form the country's second-largest lender;
 - Canara Bank and Syndicate Bank to amalgamate;
 - Union Bank of India to acquire Andhra Bank and Corporation Bank; and
 - Indian Bank to merge with Allahabad Bank.
- The biggest merger out of the four was Oriental Bank of Commerce and United Bank merging into Punjab National Bank to create a second largest state-owned bank with Rs 17.95 lakh crore business and 11,437 branches. These three banks are technologically compatible as they use Finacle Core Banking Solution (CBS) platform
- The merger of Syndicate Bank with Canara Bank will create the fourth largest public sector bank with Rs 15.20 lakh crore business and a branch network of 10,324 branches. Canara Bank will get capital infusion of Rs 6,500 crore.
- Andhra Bank and Corporation Bank's merger with Union Bank of India will create India's fifth largest public sector bank with Rs 14.59 lakh crore business and 9,609 branches. The government announced capital infusion of Rs 11,700 crore for the Union Bank of India.
- The merger of Allahabad Bank with Indian Bank will create the seventh largest public sector bank with Rs 8.08 lakh crore business with strong branch networks in the south, north and east of the country. Indian Bank will get equity infusion of Rs 2,500 crore.

The logic behind the mergers

- According to the government, banks have been merged on the basis of likely operating efficiencies, better usage of equity and their technological platform.
- But the move marks a departure from the plan to privatise some of the banks or bringing in a strategic investors to usher in reform in the sector.
- The government, after consultations, decided that amalgamation is the “best route” to achieve banking sector scale and to support the target of achieving a \$5 trillion economic size for India in five years

Previous bank mergers

- Last year, the government had merged Dena Bank and Vijaya Bank with Bank of Baroda, creating the third-largest bank by loans in the country.
- Earlier, the State Bank of India had acquired its associate banks

How this move will help?

- The Banking sector as a whole will get strengthened due to obvious efficiencies and will lead to enhanced productivity and better results thereby leading to better lending too
- The mergers should help create stronger institutions thereby leading to efficiencies of scale and stronger balance sheets.
- It will help rationalize costs across many areas including branches, people, technology etc.
- The branch network would become larger so access to bank branches would become easier provided the merged entity does not shut down all branches of merging banks

Connecting the dots:

1. More than banks, it is the operation of banks is what creates the financial inclusion. Discuss the impact on banking sector with merging
2. Why is the government keen on consolidating the banks? Are there any merits of merging the banks to create banking behemoths? Critically evaluate

AGRICULTURE

Concept of Farm ponds

Context:

- Ponds can be an effective tool for rainwater harvesting

Concerns:

- With an increased variability of monsoons and rapidly depleting groundwater tables, large parts of India are reeling under water stress.
- A number of peninsular regions like Bundelkhand, Vidarbha and Marathwada have been facing recurring drought-like situations.
- There is a need to implement innovative water management measures, stressing particularly the importance of rainwater harvesting both at the household and community levels.

What are Farm Ponds?

- A farm pond is a large hole dug out in the earth, usually square or rectangular in shape, to harvest rainwater and store it for future use.
- It has an inlet to regulate inflow and an outlet to discharge excess water.
- Farmers build ponds for many reasons: irrigation, water for livestock, fire protection, erosion control, aquaculture, wildlife value, recreation and aesthetics.
- The size and depth depend on the amount of land available, type of soil, the farmer's water requirements, cost of excavation, and the possible uses of the excavated earth.
- Water from the farm pond is conveyed to the fields manually, by pumping, or by both methods.

Retention of water through Farm ponds:

- Farm ponds retained water for 8-10 months of the year; thus farmers could enhance cropping intensity and crop diversification within and across seasons.
- The area used to cultivate vegetables and other commercial crops also increased
- In parts of peninsular India, They are being used as intermediate storage points, accelerating groundwater depletion and increasing evaporation losses as the groundwater is brought to the surface and stored in relatively shallow structures.

Why it is necessary to have inlet and outlet provisions to the Farm ponds?

- Farm ponds cannot arrest the excess run-off if there is no inlet, and therefore they cannot be used effectively for rainwater harvesting as the same happened with Maharashtra
- Further, farmers line them at the bottom with plastic, restricting seepage and converting the ponds into intermediate storage points.

- Such farm ponds have an adverse impact on the water tables and accelerate water loss.
- The usual practice here is to lift water from a dug well and/or a borewell, store it in the pond and then draw it once again to irrigate the fields, often using micro-irrigation.

What are the advantages of Farm Ponds?

- Farm ponds can be cost-effective structures that transform rural livelihoods.
- They can help enhance water control, contribute to agriculture intensification and boost farm incomes
- They aided in superior water control through the harvesting not just of rainfall but also of surface run-off and subsurface flows especially in the states of Jharkhand and west Bengal.
- They functioned exclusively as recharge points, contributing to groundwater replenishment.
- They also helped in providing supplemental irrigation in the kharif season and an enhanced irrigation coverage in rabi.
- The yield of paddy, the most important crop in kharif, stabilised, thus contributing to greater food security.

Conclusion:

Overall, farm ponds can act as effective harvesting structures and also yield healthy financial returns. But if they are promoted merely for on-farm storage of groundwater and canal water, they could accelerate, rather than reduce, the water crisis in the countryside.

Connecting the dots:

- Agriculture is always a gamble in India with multiple factors being contingent. Critically analyse the budget provisions for agriculture and suggest the necessary modifications.

[From Plate to Plough](#)

Context:

- Helping farmers produce solar energy can help realise the government's target of doubling farmers' incomes.
- In July, two interesting things happened that can help Indian farmers to a large extent in augmenting their incomes
 - **The First one**, the Union Finance Minister (FM) in her maiden budget speech asked why the annadata (farmer) cannot become the urjadata (producer of solar power)
 - **The second one**, in Parliament, the agriculture minister for state, responding to a question on the prime minister's promise of doubling farmers' income (DFI) by 2022, admitted that the existing set of policies cannot double farmers' real incomes by 2022.

Concern:

- Existing set of policies cannot double farmers' real incomes by 2022.

Doubling the Farmer's income

- Committee headed by Ashok Dalwai in April 2016 was setup.
- The Committee clarified real incomes will need to be doubled over seven years (over a base income of 2015-16), which requires a growth rate of 10.4 per cent per year.
- The Committee submitted its final report in September 2018. It comprises of 14 volumes (almost 3,000 pages) and 619 recommendations.
- The FM's statement on the annadata becoming the urjadata, the policy has the potential to double farmers incomes within a year or two.

In the Past:

- The PM has also set a target of producing 100 GW of solar power by 2022.
- He wants the country to be one of the frontrunners in the International Solar Alliance for clean energy.
- So far, the model that has been adopted to develop solar power is inviting bids from large business players. And big players did enter, ranging from Mahindra and Mahindra to the Adanis and so on.
- Some of them, who entered early into power purchase agreements (PPA) with state governments, had to burn their hands when the costs came down and state governments forced them to revise the costs of PPA downwards, upsetting their economic calculations.
- But this model of generating solar power was not very inclusive. The land is locked for solar panels for almost 25 years, and the benefits go only to a few investors.

What can be done?

- The alternative model is to help farmers produce solar power on their lands, **making annadata an urjadata.**
- This model will be much more inclusive and can help augment their incomes significantly.
- **There are two variants of this:**
 - One, replace all pump-sets, especially diesel ones, with solar pumps and the excess power generated through solar panels can be purchased by state governments at a price that gives the farmer a good margin over his cost of producing solar power.
 - Second, encourage farmers to grow "solar trees" on their lands at a height of about 10-12 feet in a manner that enough sunlight keeps coming to plants below. Under this variant, the farmer can keep growing two irrigated crops as he has been doing, but the solar tree generates a lot of excess power that can be purchased by the state government.
- The power generated under the second variant is multiple times more than under the first variant, and therefore the income augmentation can also be several times more than under the first variant.

Challenges to adopt this model

- The problem is of mobilising enough capital to instal these solar trees. In one acre you can have 500 solar trees in such a manner that even tractors can move through those and farmers can keep growing their normal two crops. It does not impact their productivity as there is ample sunlight coming from the sides for photosynthesis.
- The second pre-condition is that the state should be ready to do the power purchase agreement.

Key notes:

- The Delhi government actually announced a policy to that effect. As per their calculations, 500 trees can be put on an acre of farmer's land; the investment in solar panels (trees) will be done by other business people. The only thing that the farmer has to assure is that for 25 years he will not convert his land to other uses
- The economic calculations suggest that farmers can be given Rs one lakh/acre per annum as net income, with a six per cent increase every year for the next 25 years. This can easily double their income.

About Solar energy in India:

- India facing problems in fulfilling its energy demand, solar energy can play an important role in providing energy security.
- With its pollution free nature, virtually inexhaustible supply and global distribution, solar energy is very attractive energy resource.
- India's Intended Nationally Determined Contributions (INDC's) commitment include 100 GW of solar power out of 175 GW renewable energy by 2022

Advantages

- Solar Energy is available throughout the day which is the peak load demand time.
- Solar energy conversion equipments have longer life and need lesser maintenance and hence provide higher energy infrastructure security.
- Low running costs & grid tie-up capital returns (Net Metering).
- Unlike conventional thermal power generation from coal, they do not cause pollution and generate clean power.
- Abundance of free solar energy in almost all parts of country.
- No overhead wires- no transmission loss

Challenges in adoption

- India's solar story is largely built over imported products.
- India's domestic content requirement clause ia facing legal challenge at WTO.
- India is facing challenge to balance Prioritising domestic goals and WTO commitments.
- The dumping of products is leading to profit erosion of local manufacturers.
- Indian domestic manufacturers aren't technically and economically strong to compete with Chinese companies.
- China's strong manufacturing base is giving stiff challenge to domestic manufacturer.
- Land availability in India for solar plant is less due to high population density.

- India's solar waste is estimated to be around 1.8 million by 2050 also needs to be tackled.

Government initiatives

- Ministry of new and renewable energy is the nodal agency to tackle India's renewable energy issues.
- National Solar Mission is a major initiative of the Government of India and State Governments to promote ecologically sustainable growth while addressing India's energy security challenge.
- The Indian Renewable Energy Development Agency (IREDA) is a Non-Banking Financial Institution under the administrative control of this Ministry for providing term loans for renewable energy and energy efficiency projects.
- National institute of solar energy is created as autonomous institution under MoNRE is apex body for R&D.
- Establishment of solar parks and ultra major solar power project and enhancing grid connectivity infrastructure.
- Promotion of canal bank and canal tank solar infrastructure.
- Sustainable rooftop implementation of Solar transfiguration of India (SRISTI) scheme to promote rooftop solar power projects in india.
- Suryamitra programme to prepare qualified workforce.
- Renewable purchase obligation for large energy consumer customers.
- National green energy programme and green energy corridor.

Conclusion

- Strong financial measures are required to finance the solar projects, innovative steps like green bonds, institutional loans and clean energy fund can play a crucial role.
- Promotion of research and development in renewable energy sector, especially in storage technology.
- Proper mechanism should be provided to tackle China's dumping of solar equipments.
- Framework to avoid unnecessary delays in policy decision making and implementation.

Connecting the dots:

1. To conserve energy is to assure for a sustainable future'. Critically analyse.
2. Discuss the challenges and solution in harnessing solar energy in India?

[Uber for tractors](#)

Part of: Mains GS-III - e-technology in the aid of farmers.

In News

- Government to launch app to aid farmers where expensive agricultural equipment can be hired through the mobile application.

- Successful demo runs has been conducted in Chhattisgarh, Madhya Pradesh, Rajasthan and Punjab
- A laser-guided land leveller harnesses technology to accurately flatten a field in a fraction of the time used by a traditional oxen-powered scraper; Happy Seeder aims to prevent stubble burning that causes air pollution and Solar dryers can help farmers process and preserve their produce
- Farmers can save precious groundwater and increase productivity by 10 to 15% by using such farm equipment.
- The hurdle? Such hi-tech machines cost at least ₹3 lakh, way beyond the reach of the average small farmer.
- There are now more than 38,000 **custom hiring centres (CHCs)** across the country, which rent out 2.5 lakh pieces of farm equipment every year.
- Ministry of Agriculture plans to launch a new mobile app to efficiently connect farmers with these CHCs, just like Uber connects you to cabs
- The Ministry's app will also create an invaluable database for policy-makers, who can track the use and cost of equipment.



IASbaba

One Stop Destination for UPSC Preparation

Email ID: support@iasbaba.com
 Website: www.iasbaba.com
 Ph. No: +91 11-41678500/+91 11-41672600

To Know more about TLP PLUS
 2020 and TLP CONNECT 2020
 Scan Now.



INDEPENDENCE DAY OFFER
 Avail Additional **15% OFF** TILL
AUG 31st



IASbaba In Delhi

Programs available in Delhi:

- **PRELIMS OFFLINE – ALL INDIA PRELIMS TEST SERIES (AIPTS) 2020**
 40 General Studies (Paper 1) + 10 CSAT (Paper 2) Tests= Total 50 Tests
- **TLP PLUS 2020**
EXCLUSIVE MAINS MENTORSHIP Programme.
- **TLP CONNECT 2020**
 - Most Comprehensive Integrated Programme covering **Prelims + Mains + Interview**. **It's an Incentive-based Programme**, which runs in 3 phases. In Total **13 Months** Programme.
 - A dedicated **Mentor** to guide you through all stages of the exam.
 - Focus on Integration of Prelims and Mains preparation with a **single Schedule**.
 - Most **Practical Planning** with **45 Prelims Tests** (35 GS + 10 CSAT) and **30 Mains Tests** (12 Sectional, 2 Tests Exclusively on Ethics Case Studies, 8 Essay Tests, 8 Comprehensive Mock Tests)



Special Features (TLP PLUS and TLP CONNECT):

- **SUPER 50+ Scholarship Exam** - The entire TLP Connect/TLP Plus programme will be completely **FREE** for **Top 50 Students** (both Online and Offline mode).
For others, based on your performance you will be given a discount of **50%, 25%, 10%**. The **Exam will be held on 2 Days**, you can **either** take it on **31st August or 1st September 2019**.
- If you are clearing UPSC PRELIMS 2020, then **2nd Phase** [June 2020 to September 2020 -3 Months] **TLP Mains Mentorship will be completely FREE!!**
- If you are clearing UPSC MAINS 2020, then **3rd Phase Interview Mentorship Programme (IMP) -will be completely FREE!!**
- **Babapedia (Prelimspedia + Mainspedia): one-stop destination for all your current affairs needs – FREE!!**

* At Delhi, we have our own independent building. We aim to build a **super specialization centre** for PRELIMS CUM MAINS. There is a Separate **Study Centre, Discussion Room** available.

Why IASbaba?

- IASbaba's TLP Mains Hit Ratio – **80% (for 3 consecutive years)**
- IASbaba's ILP, AIPTS (Prelims Test Series), **60 Day Plan Hit Ratio – 70% (for 3 consecutive years)**
- **300+ Ranks from ILP and TLP Programme alone in the last 3 Years**

DELHI CENTRE:

5B, PUSA road , Opposite to Metro
 Pillar 110, Karol Bagh,
 New Delhi -110005
 (Landmark: CROMA Store)
 Ph. No: +91 11-41678500/
 +91 11-41672600



ENVIRONMENT/POLLUTION

Draft national resource efficiency policy

Part of: GS Prelims and Mains GS III – Environment Conservation

In News

- The Ministry of Environment, Forests and Climate Change has proposed a draft National Resource Efficiency Policy 2019 which aims to streamline the efficient use of these resources with minimum negative impact on environment.
- The draft policy comes in the backdrop of India increasing its material consumption to six times from 1.8 billion ton in 1970 to 7 billion ton in 2015.
- **Aim:** to minimize this inherent cost of economic growth on the natural environment by transforming country's waste management sector into a secondary resource recovery sector.
- **National Resource Efficiency Authority (NREA)** will be set up whose mandate will be developing and implementing resource efficient strategies for material recycling, reuse and land-filling targets for various sectors and set standards for reuse of secondary raw materials
- NREA would be supported by an **Inter-Ministerial National Resource Efficiency Board** to guide on the aspects critical to its implementation.
- Other measures include tax benefits on recycled materials, green loans to small and medium Enterprises (SMEs) and soft loans to construct waste disposal facilities, apart from setting up Material Recovery Facilities (MRF)

Do you know?

- India's resource extraction of 1580 tonnes/acre is much higher than the world average of 450 tonnes/acre, while material productivity remains low.
- The country's recycling rate is just about 20-25% compared with 70% in developing countries in Europe.

Coal Plants and green norms

Part of: GS Prelims and Mains GS III- Environmental Conservation

In News

- Current rules say that coal-fired power plants have to ensure that they curtail sulphur dioxide and nitrous oxide emissions by implementing appropriate technology by 2022
- A report prepared by International Institute of Sustainable Development and the Council on Energy, Environment and Water has shown that implementing clean technology in coal-fired power plants can **cost at least ₹73,000 crore**
- This could mean a minimum of **10% hike in electricity bills** for consumers

- Though cost of retrofitting plants may be high, not doing so would mean around 300,000 to 320,000 premature deaths and 5.1 crore hospital admission cases due to respiratory disorders between 2019 and 2030.

Do you know?

- India's installed power capacity as of March 2019 is 194,000 MW.
- According to the Central Electricity Authority, 166 GW of capacity requires retrofitting with flue gas desulphurisation (to meet sulphur oxide emission norms) and 66 GW with modifications or enhancements to reduce particulate matter emissions

Coastal zone management

Part of: Mains GS III- Environmental Conservation

In News

- The Environment Ministry has unveiled a draft Environmental and Social Management Framework (ESMF)
- ESMF which is a part of World Bank funded project will dictate how prospective infrastructure projects situated along the coast ought to be assessed before they can apply for clearance.
- The document was prepared by the Society for Integrated Coastal Management, an Environment Ministry-affiliated body.
- The document seeks to assist the Government of India in enhancing coastal resource efficiency and resilience, by building collective capacity (including communities and decentralised governance) for adopting and implementing integrated coastal management approaches,
- So far three coastal States, namely Gujarat, Odisha and West Bengal, have prepared Integrated Coastal Zone Management (ICZM) Plans with support from the World Bank. Such plans would be prepared for the selected coastal stretches in other States/UT.

Centre unveils plan for coastal zone management

Context:

- The Environment Ministry has unveiled a draft plan that will dictate how prospective infrastructure projects situated along the coast ought to be assessed before they can apply for clearance.

Coastal Zones:

- The Coastal zones are defined by the extent of territorial waters up to the high water mark. They are long, narrow features of mainland, islands and seas, generally forming the outer boundary of the coastal domain.
- The Coastal Zone Management (CZM) is a process of governance that consists of the legal and institutional framework necessary to ensure that development and management plans for

coastal zones are integrated with environmental and social goals, and are developed with the participation of those affected.

- Coastal zone management involves managing coastal areas to balance environmental, economic, human health, and human activities.

Purpose of Coastal Zone Management

- The goals of the Coastal Management (CZM) are to “preserve, protect, develop, enhance, and restore where possible, the coastal resources.” The purposes of Coastal Zone Management are given below:

1. To maximize the benefits provided by the coastal zone
2. To minimize conflicts and harmful effects of activities upon each other, resources and the environment
3. To promote linkages between sectoral activities
4. To guide coastal area development in an ecologically sustainable fashion

Coastal Regulation Zones

- Coastal stretches of seas, bays, estuaries, creeks, rivers, and backwaters were declared as CRZs under coastal zone regulation notification in 1991.
- CRZs have been classified into 4 zones for the purpose of regulation:
- CRZ-I: includes ecologically sensitive areas, where no construction is allowed except activities for atomic power plants, defense.
- CRZ-II: includes designated urban areas that are substantially built up. Construction activities are allowed on the landward side only.
- CRZ-III: includes relatively undisturbed areas, mainly rural areas. No new construction of buildings allowed in this zone except repairing of the existing ones. However, constructions of dwelling units in the plot area lying between 200-500m of the high tide line is allowed.
- CRZ-IV: includes the water area covered between Low Tide Line and 12 nautical miles seaward. Except for fishing and related activities, all actions impugning on the sea and tidal water will be regulated in this zone.

Environment (Protection) Act, 1986

Enacted in 1986, it is one of the most comprehensive legislations with an intent to protect and improve the environment. Article 48A under the Constitution of India specifies that the State shall endeavor to protect and improve the environment and to safeguard the forests and wildlife of the country. The objectives of this Act are as follows:-

- To protect and improve the environment qualities
- To cover all the problems of environment
- To create an authority with the purpose of environmental protection
- To provide a deterrent punishment to those who endanger human environment, safety and health

The Union Cabinet has approved the **Coastal Regulation Zone (CRZ) Notification, 2018** which were last reviewed and issued in 2011.

CRZ Notification 2018 is based on the recommendations of Shailesh Nayak committee.**New Rules under CRZ regulations**

- The government notified new CRZ Rules with the stated objectives of promoting sustainable development and conserving coastal environments.
- For the so-called CRZ-III (Rural) areas, two separate categories have been stipulated.
- In the densely populated rural areas (CRZ-IIIA) with a population density of 2,161 per sq km as per the 2011 Census, the no-development zone is now 50 m from the high-tide level, as against the 200 m stipulated earlier.
- In the CRZ-IIIB category (rural areas with population density below 2,161 per sq km) continue to have a no-development zone extending up to 200 m from the high-tide line.
- The new Rules have a no-development zone of 20 m for all islands close to the mainland coast, and for all backwater islands in the mainland.

Integrated Coastal Zone Management (ICZM):

- ICZM aims to improve livelihood of coastal communities and conserve the coastal ecosystem.
- The ICZM plan involves identification of infrastructure requirements and livelihood improvement means in coastal districts. Conservation of mangroves is among the components.
- The national component of the project includes mapping of the country's coastline and demarcation of the hazard line.
- It is a World Bank assisted project.
- It is being implemented by the Department of Forests and Environment with assistance from the Union Ministry of Environment, Forests and Climate Change (MoEFCC).
- The National Centre for Sustainable Coastal Management (NCSCM), Chennai, will provide scientific and technical inputs

In news:

- The Environment Ministry has unveiled a draft plan that will dictate how prospective infrastructure projects situated along the coast ought to be assessed before they can apply for clearance.
- The draft Environmental and Social Management Framework (ESMF) is part of a World Bank-funded project.
- The document lays down guidelines for coastal States to adopt when they approve and regulate projects in coastal zones.
- The project seeks to assist the Government of India in enhancing coastal resource efficiency and resilience, by building collective capacity (including communities and decentralised governance) for adopting and implementing integrated coastal management approaches.
- The document was prepared by the Society for Integrated Coastal Management, a Ministry-affiliated body.
- So far three coastal States, namely Gujarat, Odisha and West Bengal, have prepared Integrated Coastal Zone Management Plans with support from the World Bank.

Proposed activities

- The key activities proposed for coastal zone development that consist of investments by States include:
 - mangrove afforestation/shelter beds,
 - habitat conservation activities such as restoration of sea-grass meadows, eco-restoration of sacred groves, development of hatcheries, rearing/rescue centres for turtles and other marine animals
 - creation of infrastructure for tourism,
 - restoration and recharge of water bodies,
 - beach cleaning and development,
 - other small infrastructure facilities.

Conclusion:

- A well-informed science-based coastal zone management strategy embedded in an adequate social, institutional and legal framework, can prevent many future coastal problems.

Connecting the dots

- Discuss India's efforts for marine environment conservation and various initiatives related to it

Biodegradable Plastics

Part of: GS Prelims and Mains GS III- Environmental Conservation.

In News

- Researchers from the University of Valle de Atemajac in Zapopan, **Mexico** have created a biodegradable plastic from the juice of the prickly pear cactus (which is emblazoned on the country's flag)
- The pulp of the prickly pear is mixed with non-toxic additives to produce sheets that can be used for packaging (replacing single use plastics).
- The new material begins to break down after sitting in the soil for a month and when left in water, it breaks down in a matter of days.
- Also, it doesn't require crude oil like traditional plastics.
- Researchers are still conducting tests, but hopes to patent their product and look for partners in early 2020, with an eye towards large scale production.

Do you know?

- It's estimated that between 1.15 million to 2.41 million tonnes of plastic are entering the ocean each year from rivers.
- Biodegradable plastic is plastic that decomposes naturally in the environment. This is achieved when microorganisms in the environment metabolize and break down the structure of biodegradable plastic.

- Biodegradable plastics are made from all-natural plant materials. These can include corn oil, orange peels, starch, and plants.
- In March, UN member states committed to “significantly reduce” single-use plastics over the next decade.
- Subsequently many Indian states like Karnataka, Himachal Pradesh, Maharashtra, Tamil Nadu have banned such plastics

Plastic Pollution

Context:

- Worldwide, 75 per cent of all plastic produced is waste, and 87 per cent of this is leaked into the environment.
- In his Independence Day speech, Prime Minister Narendra Modi called for freeing India from “single-use plastic”.

Concerns:

- A study by the University of Newcastle, Australia, and published by the World Wildlife Foundation this year concluded that an average person may be ingesting 5 grams of plastic every week.
- Over one-third of plastic waste ends up in nature, especially water, which is the largest source of plastic ingestion according to the report.
- India ranks number three in terms of plastic fibres found in a sample of tap water – 82.4 per cent of tap water sampled in India contained over four plastic fibres per 500 ml

What is the present scenario of plastics?

- Plastics are organic polymers of high molecular mass and are usually synthetic, mainly derived from petrochemicals.
- Due to their low cost, ease of manufacture, versatility, non-corrosiveness and imperviousness to water, plastics are used for multiple purposes at different scales.
- Presently, over one million plastic bags and one million plastic bottles are used every minute worldwide.
- About 50% of the plastics used are single use (disposable) which constitute 10% of the total waste generated.
- And of the 7 billion tons of plastic waste generated, only 9% was recycled, 12% incinerated, and 79% accumulated in landfills or the environment.

What is the impact of plastics on environment?

- The plastics, mostly single use plastics are carried down the rivers to the oceans and this accounts for two thirds of the plastic waste present in the oceans.
- This affects the marine ecosystem as fishes are killed when they swallow plastic particles.
- Also the economic impact due to plastic pollution is high especially in fisheries and tourism sector.

- Another direct impact of plastic pollution is on the land, as it degrades slowly and leaches chemicals into surroundings and groundwater.
- Drinking water samples in different parts of the world including India reveal presence of up to 83% micro plastic concentrations.

What measures can be taken to reduce plastic pollution?

- Plastic use cannot be entirely eliminated from day to day activities, but safe disposal, reuse and reducing the quantity can be done.
- Policies should be made to restrict plastic production and encourage recycling.
- Since plastics are used by the common man, a behavioural change is necessary and segregation of household waste must be made mandatory.
- Awareness has to be created on the dangers of plastics hazards and to opt for sustainable and biodegradable products.
- Incentives for developing eco-friendly substitutes (cloth/paper/jute bags, leaves/areca leaf plates, paper straws), scientific as well as financial support must be provided.

India's Stand:

- India went big in their commitment to Beat Plastic Pollution today, with an announcement to eliminate all single-use plastic in the country by 2022. This unprecedented ambitious move against disposable plastic will drastically stem the flow of plastics from 1.3 billion people and business in the fasted growing economy in the world.
- India has 7,500 km of coastline – the 7th longest in Asia. As part of this commitment, the government will establish a national and regional marine litter action campaign as well as a program to measure the total marine plastic footprint in India's coastal waters.
- Partnership between UN Environment and BCCI to 'green cricket' across the country – aims to reduce cricket's environmental impact by greening operations and engaging fans and cricketers in green initiatives
- Government to begin a five-year exercise to compute district-level data of the country's environmental wealth. The data will be used to calculate every State's 'green' Gross Domestic Product (GDP)
- The government has also launched a 'green skilling' programme – Green Skill Development Programme (GSDP), under which youth, particularly school dropouts, would be trained in a range of 'green jobs'. GSDP aims to get 80, 000 people imparted green skills and in filling the skill gaps in the environment sector. Green Skill Development Programme will go a long way in reaping the demographic dividend of the country; GSDP to cover nearly 5 lakh people by 2021.
- Pledge to make 100 national monuments litter-free.

What is the way forward?

As individuals: We can reduce our plastic pollution and be more environmentally conscious by avoiding single-use plastics (e.g. straws, cups, cutlery, etc.) and packaging materials (e.g. polybags). Instead we

can use jute bags, glass bottles or jars, steel or ceramic cutleries and utensils, and paper-made tetra packs.

The private sector needs to invest more in producing alternatives and biodegradable plastics and in phasing out the production of plastic. More research and technology investment and development is required to make alternatives to plastic that are economically viable and affordable.

The government should play a leading role by enacting strong policies and regulations that will encourage a more sustainable model for the design and production of plastics – Local bodies mandated under rules to ensure segregation, collection and transfer of waste to registered recyclers have spectacularly failed to fulfil their responsibilities.

The State Level Monitoring Committees provided for under the rules have not been made accountable. The waste management framework is dysfunctional.

Technical and financial incentives from the government are instrumental for the transformation of the existing production system to a more sustainable one.

Connecting the dots:

1. “India’s environmental diversity and riches are universally recognised but have never been quantified.” Discuss this in context of the decision taken to calculate every State’s ‘green’ Gross Domestic Product (GDP).
2. What do you mean by plastic roads? What are its benefits?

Waste Recycling

Part of: Mains GS- III– Environmental Conservation

In News

- IIT Madras student designs system to recycle Urine,
- The project titled Water Chakra won the Indian Innovation Growth Programme 2.0 in July
- The concentrated urine is stored for three days to allow for the urea to get converted into ammonia
- By a process of steam distillation, the ammonia is segregated and this commercial grade liquid can be used to make cleaning products such as detergents or in rubber manufacturing
- Through electrochemical process 90% of the water content is recovered and can be used for gardening purposes and flushing
- The technology can be used in community toilets to generate funds for its own maintenance

Water governance strategies

Context:

- Individual States need to assume the responsibility for managing water resources in their territories

Concerns:

- India's cities are running out of water, coupled with Chennai's drinking water woes, made the 'crisis' viral, raising questions about the quality of the discourse and choice of water governance strategies in India.
- Indian cities are running out of groundwater
- A delayed monsoon or a drought, combined with compelling images of parched lands and queues for water in urban areas raise an alarm in the minds of the public.

What does the statistics says?

- Niti Aayog report says that 21 major cities are expected to run out of groundwater as soon as 2020, affecting [nearly] 100 million people
- The report's central goal was to propose a tool, an index, to monitor the States' water resource management strategies and provide the necessary course-shift, beyond supply augmentation approaches.
- The report may have had a lofty goal of promoting 'cooperative and competitive federalism' but was, in reality, a desperate move to engage with the States, in the absence of any substantive leverage to influence their approaches to water resources management.
- For almost two decades, the Central Ground Water Board (CGWB) has been reporting on the increasing number of over-exploited blocks across India, the 'dark' category blocks. The recent annual book of CGWB has reported 1,034 units, out of the 6,584 units it monitors, as over-exploited.
- Similarly, a recent report by the Central Water Commission, prepared in collaboration with the Indian Space Research Organisation (ISRO), asserted that India is not yet in "water scarcity condition". But it is certainly in a "water-stressed condition", with reducing per capita water availability.

Certain steps need to be taken to ensure a more useful and productive discourse about water governance challenges

- India needs to reconsider the institutional processes for dissemination of knowledge about water resource management. There is a certain amount of danger inherent in the casual manner in which knowledge about water resources is legitimised and consumed, particularly in these days of 'viral' information
- We need to recognise the crisis is not as much of scarcity as of delivery. The challenge is to ensure an adequate access to quality water, more so in urban areas where inequities over space and time are acute.

- We need to also realise that with the country's rapid urbanisation, demand cannot be met by groundwater reserves alone.
- The urban needs, which underpin much reporting on 'water crises', need to be met by robust long-term planning and preparation for droughts and other contingencies.

Responsibility lies with States

- We need to reconsider our approaches to water governance.
- We must recognise that the fulcrum of change and action is with the States.
- For long, water resource departments in States have continued to follow the conventional approaches of supply augmentation.
- The challenge is that of reorienting themselves towards deploying strategies of demand management, conservation and regulation.
- The Centre has to work with States towards an institutional change for the necessary course-shift.

Key notes:

'Composite Water Management Index':

- This index is an attempt to budge States and UTs towards efficient and optimal utilization of water and recycling thereof with a sense of urgency. The Index and this associated report are expected to:
- Establish a clear baseline and benchmark for state-level performance on key water indicators
- Uncover and explain how states have progressed on water issues over time, including identifying high-performers and under-performers, thereby inculcating a culture of constructive competition among states
- Identify areas for deeper engagement and investment on the part of the states.

Major Issue: Data and centre-state and inter-state cooperation are some of the key levers that can help address the crisis. Data systems related to water in the country are limited in their coverage, robustness, and efficiency.

- **Limited coverage:** Detailed data is not available for several critical sectors such as for domestic and industrial use, for which data is only available at the aggregate level and lacks the level of detail required to inform policies and allocations.
- **Unreliable data:** The data that is available can often be of inferior quality, inconsistent, and unreliable due to the use of outdated methodologies in data collection. For example, estimates on groundwater are mostly based on observation data from 55,000 wells, while there are 12 million wells in the country.
- **Limited coordination and sharing:** Data in the water sectors exists in silos, with very little inter-state or centre-state sharing, thereby reducing efficiencies.

The Composite Water Management Index (CWMI) is a major step towards creating a culture of data based decision-making for water in India, which can encourage 'competitive and cooperative federalism' in the country's water governance and management.

Conclusion:

- The Finance Minister, in her budget, repeatedly stated that the government will work with States to address India's national water security challenges. Let us hope that the government intends to strengthen federal governance of water resources towards long-term water security.

Connecting the dots:

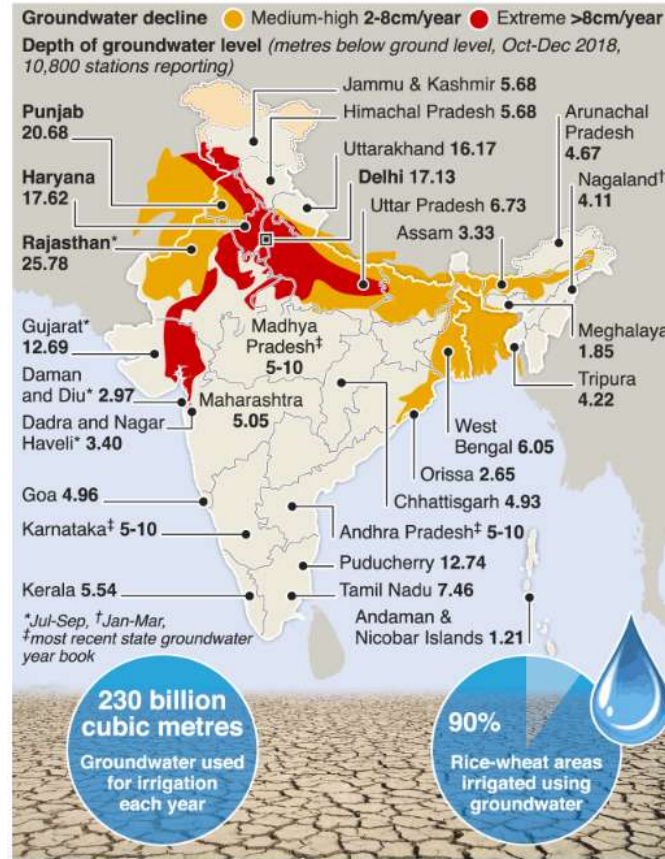
1. To solve the growing water crisis, the solution that is proposed and pushed by world bodies such as WTO and IMF through international agreements is privatisation of water. Do you think India should also privatise its water? Critically analyse.
2. Many parts of the country are facing severe water crisis and drought conditions. There are many traditional water harvesting and conservation practices in various parts of India which can be employed locally to fight the ongoing crisis. Can you identify few such practices? Also mention the states where they are more prevalent.

India's water scarcity challenge

Part of: Mains GS III- Environmental Conservation

In News

- **India, the world's largest groundwater user**, is seeing levels declining across the country with farmers in Punjab, Haryana and Rajasthan facing the prospect of having no groundwater left for irrigation by 2025.
- More than 90% of the rice-wheat areas in north-west India are irrigated using groundwater.
- **Groundwater, the source of 40% of India's water needs**, is depleting at an unsustainable rate, according to Niti Aayog,
- India accounts for 12% of global groundwater extraction, pumping some 230 billion cubic metres each year. At this rate, by 2030, nearly 60% of the aquifers will be in a critical state.
- Consecutive years of weak monsoons, massive deforestation, poor rainwater harvesting and pollution of rivers and lakes have led the country to depend on groundwater.



<https://www.graphicnews.com/en/pages/39416/ENVIRONMENT India groundwater stress>

A jan andolan for water

Context:

- Prime Minister Narendra Modi announced the Jal Jeevan Mission, which plans to supply water to all households by 2024.

Concern:

- For many years, the central and state governments have been making efforts to increase access to safe and adequate drinking water.
- While states like Sikkim and Gujarat have managed to achieve high levels of HWS, a relatively low percentage of rural Indian households have access to this service
- The strategy so far to increase access to HWS faced obstacles, including not paying enough attention to sustaining or recharging groundwater, the primary source, and treating service delivery primarily as an engineering solution, without adequate involvement of the users.

Challenges and solutions:

1. At policy level:

- The institutional landscape for water at both the Centre and state government has been somewhat fragmented, with several ministries in Delhi and departments in states dealing with different aspects of water management, with overlapping roles and responsibilities.

Solution:

- The creation of the Jal Shakti Mantralaya in the Government of India to integrate the management of India's water resources and supply of drinking water is a landmark step in diagnosing and addressing the problem.

2. At implementation level:

- The inadequate attention to taking concrete measures to sustain the source of the water, in most cases groundwater.
- Instead of taking simple and local measures, like creating rainwater harvesting structures and point recharge structures in the vicinity of borewells, the emphasis has been more on maximising the pumping of water and distributing it through pipes.
- This led to many of the systems either shutting down or functioning sub optimally due to the groundwater source having dried up.

Solution:

- The proposed Jal Jeevan Mission will make source sustainability measures mandatory prior to pumping and distributing water to households.

3. Traditional approach to service delivery:

- The provision of drinking water was viewed primarily as an engineering solution, with schemes being planned and executed by the public health and engineering departments.
- water is an ideal sector for the applicability of the principle of subsidiarity — the idea that a central authority should have a subsidiary function, performing only those tasks which cannot be performed effectively at a more immediate or local level.

Solution:

- The Jal Jeevan Mission's first preference will be to have single village ground water-based schemes, wherever sufficient quantity and good quality of groundwater exists.
- These schemes would be managed by the community itself through the setting up of a village water and sanitation committee, a sub-committee of the gram panchayat.
- It is, therefore, planned to include a mandatory provision under the Jal Jeevan Mission for the effective channeling and treatment of household waste water (known as grey water), through appropriate and low cost drainage and treatment systems.
- On the lines of the Swachh Bharat Mission, extensive information, education and communication will be needed to create a jan andolan for water management.
- The ongoing Jal Shakti Abhiyan will help in creating awareness about the importance of integrating source sustainability and water reuse with the provision of household water supply

Key notes:

Jal Shakti Ministry

- The new ministry has been formed by merging the Ministry of Water Resources, River Development and Ganga Rejuvenation and Ministry of Drinking Water and Sanitation.
- All water related works will be merged under one ministry.
- The new ministry will encompass issues ranging from providing clean drinking water, international and inter-states water disputes, to the Namami Gange project aimed at cleaning Ganga and its tributaries, and sub tributaries.

Conclusion:

- This integrated approach to decentralised, community managed, and sustainable water management is the backbone of the government's plan to ensure that every household gets the benefits of water supply. The Jal Jeevan Mission will be a major step towards improving our people's ease of living and meeting their aspirations of a New India.

Connecting the dots:

1. India's traditional water harvesting techniques provide a sustainable water management alternative. Do you agree? Critically examine
2. Why has water become a stressed resource in many parts of the world? Analyse.
3. Many parts of the country are facing severe water crisis and drought conditions. There are many traditional water harvesting and conservation practices in various parts of India which can be employed locally to fight the ongoing crisis. Can you identify few such practices? Also mention the states where they are more prevalent.

Composite Water Management Index 2.0

Part of: GS Prelims and GS Mains III –Environmental Conservation

In News

- NITI Aayog has released the **second Round of Composite Water Management Index**
- **Gujarat hold on to its rank one** in the reference year (2017-18), followed by Andhra Pradesh, Madhya Pradesh, Goa, Karnataka and Tamil Nadu.
- 80% of states assessed on the Index over the last three years have shown improvement in water management scores, with an **average improvement of +5.2 points**.
- In North Eastern and Himalayan States, **Himachal Pradesh** has been adjudged number 1 in 2017-18 followed by Uttarakhand, Tripura and Assam.
- The Union Territories have first time submitted their data and Puducherry has been declared as the top ranker.

Do You Know?

- Nearly **600 million Indians** faced **high to extreme water stress** and about 2,00,000 people died every year due to inadequate access to safe water.
- NITI Aayog first launched and conceptualized the Composite Water Management Index in 2018 as a tool to instill the sense of **cooperative and competitive federalism** among the states.
- The 'index' aims at capturing how well States have done on groundwater and surface water restoration, implementing major and medium irrigation projects, watershed development, participatory irrigation management, on-farm water use, rural and urban water supply, and policy and governance.
- The 16 low-performing States collectively account for 48% of the population, 40% of agricultural produce, and 35% of economic output for India.

[Report by IPCC](#)

Context:

- A new report by the Intergovernmental Panel on Climate Change (IPCC) released Thursday presents the most recent evidence on how the different uses of land — forests, agriculture, urbanisation — are affecting and getting affected by climate change.

What is IPCC?

- This is an intergovernmental body under the UN. It is a scientific body
- Formed in 1988 by WMO (World Meteorological Organisation) and UNEP
- It produces report based on scientific developments across the world.
- The IPCC does not carry out its own original research, nor does it do the work of monitoring climate or related phenomena itself. The IPCC bases its assessment on the published literature
- IPCC has so far produced five assessment reports, the latest one was published in 2014. It said that India's high vulnerability and exposure to climate change will slow its economic growth, impact health and development, make poverty reduction more difficult and erode food security
- It was awarded the Nobel peace prize in 2007
- IPCC functions under UNFCCC
- The aims of the IPCC are to assess scientific information relevant to :
 - Human-induced climate change,
 - The impacts of human-induced climate change,
 - Options for adaptation and mitigation

What the new IPCC report says on land and climate change

- This is the first time that the IPCC, whose job it is to assess already-published scientific literature to update our knowledge of climate change science, has focused its attention solely on the land sector.

- A new report by the Intergovernmental Panel on Climate Change (IPCC) released Thursday presents the most recent evidence on how the different uses of land — forests, agriculture, urbanisation — are affecting and getting affected by climate change.
- The Geneva-based IPCC is the United Nations body for assessing the science related to climate change. It was created “to provide policymakers with regular scientific assessments on climate change, its implications and potential future risks, as well as to put forward adaptation and mitigation options”.

The land-climate link

- Land use, and changes in land use, have always been an integral part of the conversation on climate change. That is because land acts as both the source as well as a sink of carbon.
- Activities like agriculture and cattle rearing, for example, are a major source of methane and nitrous oxide, both of which are hundreds of times more dangerous than carbon dioxide as a greenhouse gas.
- At the same time, soil, trees, plantations, and forests absorb carbon dioxide for the natural process of photosynthesis, thus reducing the overall carbon dioxide content in the atmosphere.
- This is the reason why large scale land use changes, like deforestation or urbanisation, or even a change in cropping pattern, have a direct impact on the overall emissions of greenhouse gases.

The IPCC's reports

- This is the first time that the IPCC, whose job it is to assess already-published scientific literature to update our knowledge of climate change science, has focused its attention solely on the land sector.
- It is part of a series of special reports that IPCC is doing in the run-up to the sixth edition of its main report, blandly called the Assessment Reports, that is due around 2022.
- Last year, the IPCC had produced a special report on the feasibility of restricting global rise in temperature to within 1.5 degrees Celsius from pre-industrial times. These reports were sought by governments to get a clearer picture of specific aspects of climate change.

Previous report

- The Intergovernmental Panel on Climate Change (IPCC) approved a Special Report on Global Warming of 1.5°C on October 6, 2018 at Incheon, South Korea.
- The report focusses on keeping warming to under 1.5°C as compared to pre-industrial times.
- Preventing an extra single degree of heat could make a life-or-death difference in the next few decades.
- So it calls for the world's leaders to limit future human-caused warming to just 0.5°Celsius from now.
- This is, notably, well below the earlier globally agreed-upon goal of 1° C from now.
- The report details how Earth's weather, health and ecosystems could be made better.

- It will be a key scientific input into the Katowice Climate Change Conference in Poland in the coming December.
- The governments will review the Paris Agreement to tackle climate change in this upcoming conference

What present report says

- The current report talks about the contribution of land-related activities to global warming — how the different uses of land, like agriculture, industry, forestry, cattle-rearing, and urbanisation, was affecting emissions of greenhouse gases.
- An important part of the report talks about the manner in which even existential activities like food production contributes to global warming and is also affected by it.
- The report says that if pre-production activities like cattle rearing and post-production activities like transport, energy and food processing, is taken into account, then food production could contribute as much as 37 per cent of all greenhouse gas emissions every year.
- It points out that nearly 25 per cent of all food produced is either lost or wasted. And even the decomposition of the waste releases emissions.

Land, oceans, forests

- Land and ocean together absorb nearly 50 per cent of greenhouse gases emitted every year through natural processes in the carbon cycle. The importance of land, or ocean, as a carbon sink, thus cannot be overstated in the global fight against climate change. That is why afforestation, and reduction in deforestation, are vital approaches in a global strategy to combat climate change.

Conclusion

- India's action plan on climate change too, has a very important component on forests. India has promised that it would create an additional carbon sink of about 2.5 billion to 3 billion tonnes by the year 2032 by increasing its forest cover, and planting more trees.

Connecting the dots:

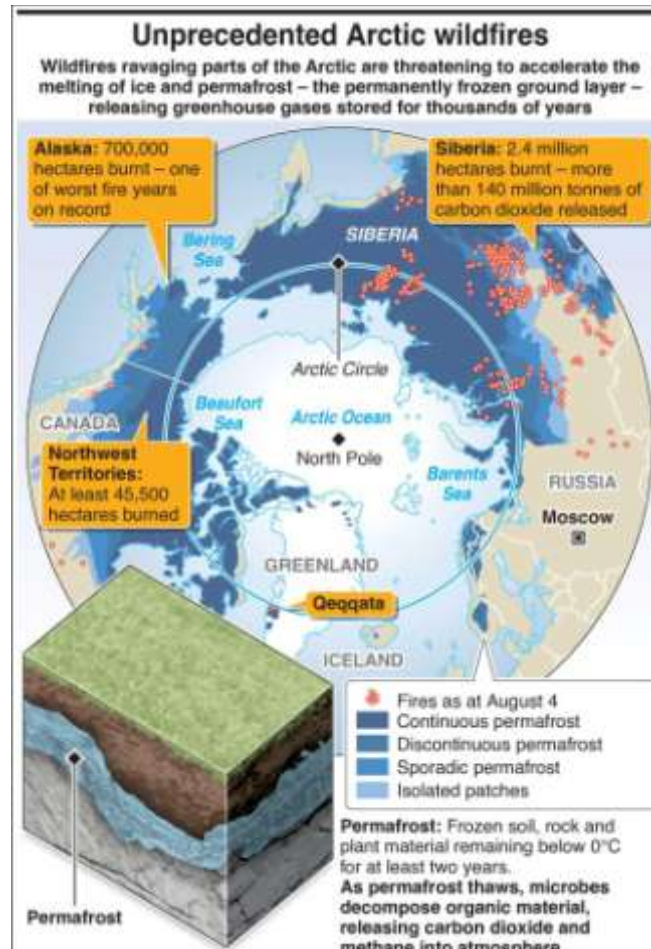
1. Discuss the factors responsible for long term climate change. What evidences do we have that support current global warming. Explain.
2. The fight against climate change is more effective at the household level than macro level policy formulations. Do you agree? Substantiate.
3. Critically evaluate the emerging trends in global climate change negotiations. Is the world heading in the right direction in its fight against climate change? Critically examine.

[Arctic wildfires](#)

Part of: Mains GS-II – Environmental Conservation

In News

- Wildfires ravaging parts of the Arctic are threatening to **accelerate the melting of ice** and permafrost -- the permanently frozen ground layer -- releasing greenhouse gases stored for thousands of years.
- Although wildfires are frequent in the northern hemisphere between May and October, scientists estimate the magnitude of this season's burn is higher than any other in the 16-year-record
- Fires are burning farther north, and scientists worry the forest fires are igniting **peat fires**.
- Peat stores large amounts of carbon, which is burning and releasing record amounts of carbon dioxide (CO₂) into the atmosphere.
- As the planet warms, more and more frozen peat and permafrost has thawed, releasing large amounts of carbon.
- **Permafrost:** Frozen soil, rock and plant material remaining below 0°C for atleast two years. As permafrost thaws, microbes decompose organic material releasing Carbon dioxide and methane into atmosphere.



https://www.graphicnews.com/en/pages/39404/DISASTERS-Arctic-wildfires_infographic

Paddy stubble burning

Part of: GS Prelims and Mains GS-III – Environment

In News

- Burning of paddy crop residue, one of the major causes of air pollution, **declined by 41% last year over 2016-level** in Punjab, Haryana, Uttar Pradesh and Delhi-NCR with the help of a ₹1,151 crore central scheme.
- 23 million tonnes of rice residue were being burnt in rice-wheat cropping system (around 4.1 million ha) in this region to clear the field for conventional wheat sowing because of the narrow window (about 10-20 days) between rice harvesting and wheat sowing.
- Crop residue burning in north-west India contributes to air pollution, health hazards, disruption of transportation, school closures and soil degradation.
- To tackle this issue, government launched Central Sector Scheme - '**Promotion of Agricultural Mechanization for In-Situ Management of Crop Residue in the State of Punjab, Haryana, Uttar Pradesh and NCT of Delhi**'
- The scheme involved

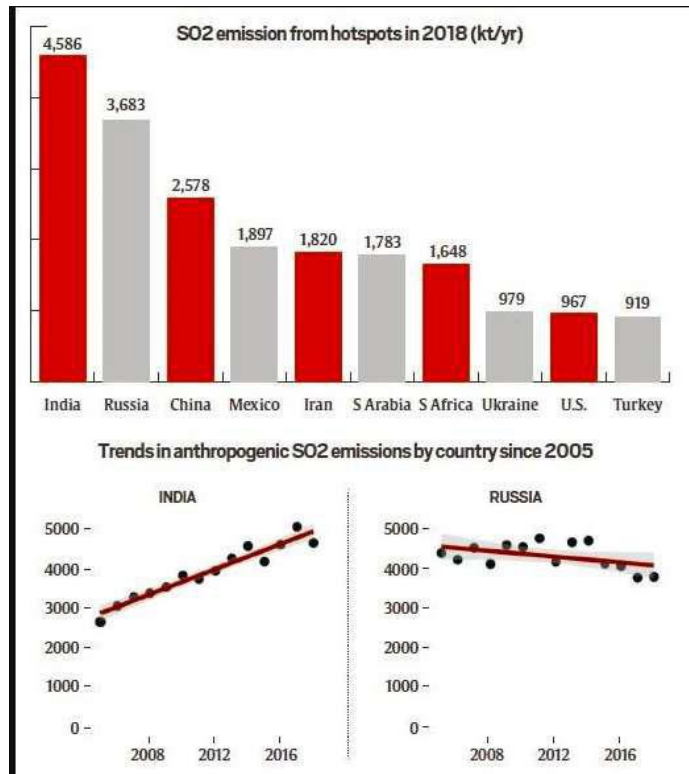
- Distribution of in-situ crop residue management machinery to the farmers on subsidy
- Establishment of Custom Hiring Centres (CHCs) of in-situ crop residue management machinery
- Undertaking Information, Education and Communication (IEC) activities for creating awareness among farmer
- ICAR is implementing the scheme through 60 Krishi Vigyan Kendras (KVKs) of Punjab (22), Haryana (14), Delhi (1) and UP (23).
- More than **4500 villages** in Punjab and Haryana were declared as **Zero Stubble Burning Villages** during 2018 as not a single crop burning incident was reported from these villages during the year.
- In addition to the above Scheme, separate funds are being allocated to the States for crop residue management under **Sub-Mission on Agriculture Mechanization by the Department of Agriculture Cooperation and Farmers Welfare**

Sulphur dioxide Pollution

Part of: GS Prelims and GS Mains III – Environmental Pollution

In News

- A new report by Greenpeace India shows that India is the largest emitter of sulphur dioxide in the world
- More than 15% of all the anthropogenic sulphur dioxide hotspots detected by the NASA OMI satellite (Ozone Monitoring Instrument) lies in India
- Almost all of these emissions in India are because of coal-burning
- The vast majority of coal-based power plants in India lack **flue-gas desulphurisation technology** to reduce air pollution
- The Singrauli, Neyveli, Talcher, Jharsuguda, Korba, Kutch, Chennai, Ramagundam, Chandrapur and Koradi thermal power plants or clusters are the major emission hotspots in India
- India had introduced, for the first time, sulphur dioxide emission limits for coal-fired power plants in December 2015.
- But the deadline for the installation of flue-gas desulphurisation (FGD) in power plants has been extended from 2017 to 2022.
- Of the world's major emitters, China and the United States have been able to reduce emissions rapidly. They have achieved this feat by switching to clean energy sources.



<https://images.indianexpress.com/2019/08/aws.w.jpg?w=517&h=587&imflag=true>

Lake Conservation

Part of: GS Prelims and GS Mains III – Environmental Conservation

In News

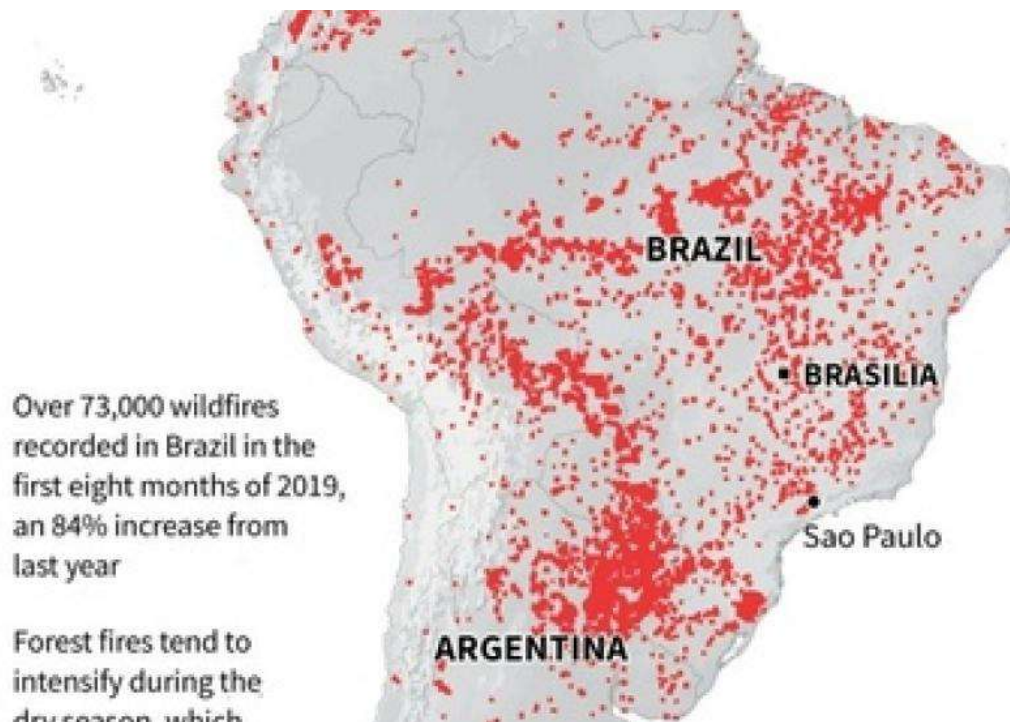
- The **Odisha** Wetland Authority has approved implementation of an integrated management plan for Chilika and Ansupa lakes at an estimated cost of Rs 180 Crore.
- **Chilika, country's largest brackish water lagoon**, is spread over 1,100 sq km. Lakhs of tourists visit the lake to watch endangered Irrawaddy dolphins and migratory birds during winter
- **Ansupa, Odisha's largest freshwater lake**, is spread over almost 2 sq km. Ansupa is famous for its sweet water fish and is also the wintering ground for 32 species of migratory birds.
- The five-year management of lakes is intended at strengthening livelihood of thousands of fishermen relying on the two water-bodies. Besides, tourism promotion and conservation of ecology will be taken up.

Amazon Wildfires

Part of: GS Prelims and GS Mains II- Environmental Conservation

In News

- Man-made fires in the world's largest rainforest have sent smoke to populated cities and the Atlantic coast
- It is not unusual to see fires in Amazon forests at this time of year due to high temperatures and low humidity which creates dry favourable conditions for natural wild fires.
- However, wildfires raging in the Amazon rainforest have hit a record number this year, with 72,843 fires detected so far. Forest fires in the region have doubled since 2013, and **increased by 84%** compared to the same period last year.
- Environmental activists blamed President Bolsonaro for the current situation, saying he **encouraged loggers and farmers to clear the land by burning** down the forests.
- The largest rainforest in the world, the Amazon is a vital carbon store that slows down the pace of global warming.
- The Amazon rainforest produces approximately 20% of oxygen in the Earth's atmosphere.
- It is also home to about three million species of plants and animals, and one million indigenous people, which is now under threat due to encroachment by the Brazil government, foreign corporations and governments with economic interests in the resource-rich region, and local farmers



<https://www.ibtimes.com/brazils-bolsonaro-blames-amazon-fires-ngos-twitter-erupts-2816406>

[Why Amazon fires are worrying](#)

Context:

- Man-made fires in the world's largest rainforest have sent smoke to populated cities and the Atlantic coast.

Concern:

- Over the last several days, the Amazon rainforest has been burning at a rate that has alarmed environmentalists and governments worldwide. Mostly caused by farmers clearing land, the fires have thrown the spotlight on Brazil President Jair Bolsonaro's policies and anti-environment stance

Where are the Amazon fires happening?

- Started in the Amazonian rainforests, the fires have impacted populated areas in the north, such as the states of Rondonia and Acre, blocking sunlight and enveloping the region in smoke.
- The smoke has wafted thousands of miles to the Atlantic coast and São Paulo, according to the World Meteorological Organization.
- Brazil's National Institute for Space Research (INPE) has reported that forest fires in the region have doubled since 2013, and increased by 84% compared to the same period last year.
- This year alone there have been 72,843 fires, it said, and more than 9,500 of those have happened over the past few days.

How did the Amazon fires start?

- The weekly Brasil de fato reported that Bolsonaro's anti-environment rhetoric has emboldened farmers, who organised a "fire day" along BR-163, a highway that runs through the heart of the rainforest. The weekly quoted a report by local newspaper Folha do Progresso, that local farmers had set fire to sections of the rainforest a few days ago to get the government's attention. "We need to show the President that we want to work and the only way is to knock it down. And to form and clear our pastures, it is with fire," Folha do Progresso quoted one farmer as saying.
- Alberto Setzer, a researcher at INPE, told Reuters that this year, the region did not experience extreme dry weather. "The dry season creates the favourable conditions for the use and spread of fire, but starting a fire is the work of humans, either deliberately or by accident."
- The Amazon fires are so large that they are visible from space. NASA released images on August 11 showing the spread of fires and reported that its satellites had detected heightened fire activity in July and August.

Why are the Amazon fires a cause for concern?

- The Amazon rainforest is a repository of rich biodiversity and produces approximately 20 per cent of oxygen in the Earth's atmosphere.
- It is also home to indigenous communities whose lives and homelands are under threat due to encroachment by the Brazil government, foreign corporations and governments with economic interests in the resource-rich region, and local farmers.
- In a 2017 study, the University of Leeds found that carbon intake by the Amazon basin matches the emissions released by nations in the basin.

- The burning of forests, therefore, implies additional carbon emissions. Research by scientists Carlos Nobre and Thomas E Lovejoy suggests that further deforestation could lead to the Amazon's transformation from the world's largest rainforest to a savanna, which would reverse the region's ecology.
- A National Geographic report said the Amazon rainforest influences the water cycle not only on a regional scale, but also on a global scale.
- The rain produced by the Amazon travels through the region and even reaches the Andes mountain range. Moisture from the Atlantic falls on the rainforest, and eventually evaporates back into the atmosphere.
- The report said the Amazon rainforest has the ability to produce at least half of the rain it receives. This cycle is a delicate balance.

What environmental protections do Brazil's laws provide, and what has changed in recent times?

- Under Brazil's Forest Code of 1965, farmers could purchase Amazon land but could farm only 20% of it. Following the collapse of the military dictatorship in 1988, a new constitution gave indigenous populations legal ownership of their land and the right to reject development of their land.
- In 2012, the Forest Code was revised to reduce the area of deforested land required to be restored, and to reduce penalties for illegal deforesting.
- In 2018, Brazil's Supreme Court upheld these changes.
- Bolsonaro, who took office in January 2019, had promised during his election campaign that his government would open up the Amazon region for business.
- The Amazon has large reserves of gold and other minerals. Along with aggressive policies of promoting agribusiness, Bolsonaro has opposed protections for indigenous tribal land. A few months before he won, The Washington Post reported that Bolsonaro had recommended exploiting the country's natural resources by tapping into the Amazon basin.
- After the victory, he was quoted as saying: "Brazil should not sit on its natural reserves because a handful of Indians want to conserve it."
- Since the 1960s, the Amazon has witnessed large-scale deforestation because of cattle-ranching, logging, power projects, mining and farming. Agribusiness products in 2016 represented 46% of Brazil's exports. Conservationists believe that for Brazil's government, short-term economic interests pushed by lobbies take precedence over environmental concerns.

How has the government reacted to the concerns over the fires?

- Bolsonaro has dismissed the INPE findings and said it was the time of the year when farmers burn the land for farming.
- In July, he fired INPE scientist Ricardo Galvao for publishing agency data that showed the accelerated rate of deforestation, calling the figures a lie and the images manipulated. Al Jazeera English quoted Bolsonaro as saying that "a report like this one that does not match the truth can cause a great damage to the image of Brazil". INPE has defended its data

How has the international community reacted?

- Germany and Norway have suspended funding for programmes that aim to stop deforestation in the Amazon and have accused Brazil of doing little to protect the forests. Indigenous groups and environment activists have led protests and criticised Bolsonaro for his comments and policies.

Connecting the dots:

1. What are the causes for forest fires. Discuss the measures to prevent Forest fires

How govts set climate targets

Context:

- In their recent joint declaration, India and France have committed to making long-term plans to contain emissions. While most countries set targets against a deadline, there is a case for longer-term planning
- During Prime Minister Narendra Modi's visit to Paris last week, a substantial part — nine out of 34 paragraphs — of the joint statement by India and France was dedicated to the related issues of climate change, biodiversity, renewable energy, and ocean resources

The joint statement by India and France

- It talked about the two countries' commitment to enhanced climate actions, their support for new low-carbon technologies, and their on going efforts to accelerate development and deployment of renewable energy.
- It mentioned the need for sustainable use of marine resources, acknowledging the link between environment and security, and promised to work towards "ocean governance"
- The two sides also promised to develop, by next year, strategies for containing their greenhouse gases in the long-term period, possibly for the next 30 or 50 years. From India's point of view at least, a longer-term low-carbon pathway would be a new development.

Countries & climate targets

- Under the 2015 Paris Agreement on climate change, which will come into force next year, every signatory country is supposed to declare and implement a climate action plan, called Nationally Determined Commitments (NDCs).
- Until now, countries have mostly announced their targets for 2025 or 2030.
- India's declared targets, for example, are for 2030. It has said it would bring down its emission intensity, or emission per unit of GDP, by 33 to 35 per cent by 2030 compared to 2005 levels.
- It has further promised to ensure that at least 40 per cent of its electricity in 2030 would be generated from non-fossil sources, and to create an additional carbon sink of 2.5 to 3 billion tonnes through forests.
- Each of these actions, and many more for which specific targets have not been declared, would contribute in reducing India's greenhouse gas emissions.

- All other signatories to the Paris Agreement have declared similar action plans. NDCs have to be updated every five years.
- The first set of NDCs were declared in 2015 ahead of the climate change conference in Paris. Countries will have to update these next year.
- The Paris Agreement asks all signatories to ensure that successive NDCs represent a progression from their current targets.
- Countries have also been asked to evolve a common time-frame for their action plans.
- Successive NDCs, therefore, would all be five-year or ten-year action plans.

Longer-term vision

- It has long been argued that countries need to finalise and commit to longer-term climate targets, over 30-year or 50-year time horizons.
- This will not just help in bringing more predictability into climate actions but also make it easy to monitor whether the world was progressing adequately to avoid the catastrophic impacts of climate change.
- It is argued that short-term targets can lack the urgency of the task, and can delay ambitious action, so that a couple of decades later, the climb could become so steep that it would be impossible to scale.
- In this context, there is a growing clamour to put pressure on the big emitters – China, the United States, European Union, India, Russia, Brazil, Australia – to come up with long-term action plans, in particular to aim for net-zero emissions in the year 2050.
- The noise is strongest in Europe, since it is the biggest combined emitter from the developed country group after the United States, which has announced a withdrawal from the Paris Agreement under the Trump administration.
- As part of its NDCs, the European Union of 27 countries has set a combined target of 40 per cent reduction in its greenhouse gas emissions by 2030 from the 1990 levels.
- Last year, however, it also came up with a long-term vision, saying Europe would aim to become climate-neutral, or attain the goal of net-zero emissions, by 2050.
- Two months ago, the United Kingdom became the first major economy to legislate a law to make itself climate-neutral by 2050.
- It had been previously aiming to achieve an 80 per cent reduction from the 1990 levels.
- As climate-induced extreme weather events bring in more and more disasters across the world, the demand for longer-term commitments on climate action has been increasing.
- Two recent reports by the Intergovernmental Panel on Climate Change (IPCC) – on the feasibility of containing global rise in temperatures to within 1.5°C from pre-industrial times, and another on state of climate-induced land degradation – have also stressed the need for more urgent and ambitious climate action in longer term.

Long-term action in India

- India, being a developing country, is treated differently from developed country parties like the US, European Union or Australia in the Paris Agreement.

- It is not obligated to take as ambitious targets as the developed world. But India also happens to be the third biggest emitter of greenhouse gases, after China and the United States, if the European Union is not counted as one entity.
- As such, there have been demands from India, as well as other major developing economies such as Brazil and South Africa, to also come up with longer-term commitments.
- In fact, there was a move from France to encourage India to make a commitment like this in the joint statement itself, but New Delhi resisted the pressure.
- India says, being a developing country, it was already doing much more than many developed countries, and committing to anything more than that was likely to hamper its development imperatives.
- It has also said that it was on course for achieving all its targets under its NDC well in time, and may even over-achieve them.
- But New Delhi is also conscious of the fact that the developed countries are far from delivering on their climate promises, especially on their obligation to provide money and technology to help developing and poor countries in fighting climate change

Connecting the Dots

1. Discuss the factors responsible for long term climate change. What evidences do we have that support current global warming. Explain.
2. The fight against climate change is more effective at the household level than macro level policy formulations. Do you agree? Substantiate.

Bonn Challenge

Part of: GS Prelims and Mains GS-III – Environment Conservation

In News

- **India for the first time** will be **hosting** the 14th session of the Conference of Parties (COP-14) of the United Nations Convention to Combat Desertification (**UNCCD**) from 2nd -13th September 2019
- Bonn Challenge is a **global effort** to bring 150 million hectares of the world's deforested and degraded land into restoration by 2020, and 350 million hectares by 2030
- At the UNFCCC COP 2015 in Paris, India also joined the **voluntary** Bonn Challenge pledge to bring into restoration **13 million hectares** of degraded and deforested land by the year 2020, and additional **8 million hectares** by 2030.
- In India about 29% or about 96.4 million hectares are considered degraded (soil becoming unfit for cultivation)
- Pradhan Mantri Fasal Bima Yojana, Soil Health Card Scheme, Soil Health Management Scheme and Pradhan Mantri Krishi Sinchayee Yojana are some of the schemes to tackle land degradation.

Do You know?

- United Nations has 3 Rio Conventions namely, United Nations Framework Convention on Climate Change (UNFCCC), Convention on Biological Diversity (CBD) and United Nations Convention to Combat Desertification (UNCCD).
- Established in 1994 UNCCD is the only legally binding international agreement linking environment and development issues to the land agenda
- In 1994, the United Nations General Assembly declared **17 June the "World Day to Combat Desertification and Drought"** to promote public awareness and the implementation of the UNCCD

Marine Fisheries Regulation and Management (MFRM) Bill 2019**In news:**

- A Marine Fisheries Regulation and Management (MFRM) Bill 2019 is in the public domain for discussion.
- India has obligations to frame laws under the United Nations Convention on the Law of the Sea (UNCLOS) 1982 and the World Trade Organisation (WTO) agreements.

UNCLOS:

Under UNCLOS, which India ratified in 1995, the sea and resources in the water and the seabed are classified into three zones — the internal waters (IW), the territorial sea (TS) and the exclusive economic zone (EEZ).

- The IW is on the landward side of the baseline — it includes gulfs and small bays. Coastal states treat IW like land.
- The TS extends outwards to 12 nautical miles from the baseline — coastal nations enjoy sovereignty over airspace, sea, seabed and subsoil and all living and non-living resources therein.
- The EEZ extends outwards to 200 nautical miles from the baseline. Coastal nations have sovereign rights for exploration, exploiting, conserving and managing all the natural resources therein.

Importance of having the regulation:

- Since fisheries is a state subject, fishing in the IW and TS come within the purview of the states concerned. Other activities in the TS and activities, including fishing beyond the TS up to the limit of the EEZ, are in the Union list. No Central government, so far, has framed laws covering the entire EEZ. This would be the first one to regulate fisheries in comprehensive manner.
- The annual fishery potential of the country's EEZ is about 5 million tonnes. Utilising it judiciously is an important priority of the government. It has been underscored by the formation of a new fisheries ministry.

- The Bill is also a response to discussions on fisheries' of 2001. India has been defending the rights of developing nations for special and differential treatment. Developed countries contend that nations without laws to manage fisheries in their respective EEZs are not serious about unregulated fishing. The MFRM Bill is India's response to such sentiments.

Pros:

- Bigger vessels, particularly trawlers, registered and licenced under state departments, will need a permit to fish. This is a welcome measure to manage the fishing sector.
- The Bill respects the jurisdiction of our coastal states over the TS.
- It proposes social security for fish workers and calls for protection of life at sea during severe weather events.

Cons:

- The Bill prohibits fishing by foreign fishing vessels, thus nationalising our EEZ. An Indian fishing vessel desirous of fishing in the EEZ, outside the TS, must obtain a permit. This requirement has been contested by the fishing industry — particularly small-scale operators.
- There is a faulty assumption in the Bill that only large-scale vessels fish outside the TS. Actually, thousands of small-scale fishing crafts regularly venture into such areas. Their freedom to access fish outside the TS will cease if the Bill becomes law. A few exemption clauses to safeguard their livelihoods should be incorporated in the Bill.
- The Bill lacks congruence with important regional fishery agreements. It is incomplete compared to the regulations in other coastal nations.

Conclusion:

- Fish cannot be bound by territoriality diktats of the Centre or states. Cooperative governance between them over different territories (IW, TS and EEZ) is key to the sustainable management of marine fisheries.
- Small-scale fish workers can demand making the entire IW and TS completely free of trawling using the FAO/UN Small-Scale Fisheries Guidelines to support their arguments. This will raise their incomes, ensure a steady supply to consumers, heal the coastal areas and curb the bane of destructive fishing.

Connecting the dots:

- India is yet to have a central regulation on fisheries. In this light discuss the importance of Marine Fisheries Regulation and Management (MFRM) Bill.

ANIMALS/NATIONAL PARKS IN NEWS

Giant parrots

Part of: GS Prelims and Mains GS- III– Biodiversity

In News

- The remains of a super-sized parrot that stood more than 3 feet tall (half the height of average human) and roamed the Earth 19 million years ago have been discovered in New Zealand.
- The parrot has been named ***Heracles inexpectatus*** to reflect its Herculean size and strength — and the unexpected nature of the discovery
- The bird was approximately the size of the giant “dodo” pigeon and twice the size of the critically endangered flightless New Zealand kakapo, previously the largest known parrot.
- Last year, scientists found the remains of a giant burrowing bat that lived millions of years ago in the same region.
- New Zealand, home to the now-extinct flightless bird moa which was up to 3.6 metres tall with neck outstretched, is well known for its giant birds.

Tardigrades

Part of: GS Prelims and Mains GS III - Environment

In News

- Tardigrades may have survived spacecraft crashing on moon
- The **Israeli spacecraft called Beresheet** was meant to be the first private lander to touch down on the moon.
- However, mission controllers lost contact in April which led the spacecraft to **crash onto moon**.
- Now it's been revealed that the mission was carrying a cargo of dehydrated microscopic lifeforms known as **tardigrades** which **may have survived** the crash.
- Tardigrades are a phylum of water-dwelling eight-legged segmented micro-animals. They are colloquially known as **water bears** or **moss piglets**.
- They are tiny animals that can withstand extreme temperatures, extreme dryness, and lack of food.
- They can withstand both the vacuum of space, and pressure as powerful as that at the deepest point in Earth's ocean. They are also resistant to radiation

Translocation of Wild Buffaloes

Part of: GS Prelims and Mains GS II – Environmental Conservation

In News

- Five female **wild buffaloes** will travel more than 1,500 km crossing five States from Manas National Park in **Assam** to the Udanti Wildlife Sanctuary in **Chhattisgarh**
- This is being done to help revive the waning population of **Chhattisgarh's State animal** and expand its territory across States.
- With just nine buffaloes, including three females, left in the Udanti Wildlife sanctuary, their revival across central India, a historical habitat, rests on hassle-free translocation, successful breeding and subsequent restocking of other habitats in the region
- The estimated population of the wild buffaloes (*Bubalus arnee*) in the Northeast is around 3,000-4,000, the largest in the country and accounting for 92% of the world population.
- It is listed under Schedule 1 of the Wild Life (Protection) Act, 1972, and classified as **endangered** in the IUCN Red List of Threatened Species.

Conservation of Otters

Part of: GS Prelims and GS Mains III – Environmental Conservation

In News

- The Eighteenth Conference of the Parties (CoP18) of the Convention on International Trade in Endangered Species of Wild Fauna and Flora (**CITES**) was recently held in Geneva.
- Members at the Conference have voted to move the **smooth-coated otter** (*Lutrogale perspicillata*) from CITES Appendix II to CITES Appendix I, a species **native to the Indian subcontinent** and some other parts of **Asia**
- This is done as otters are considered to be facing a high risk of extinction and is **detrimentally affected by international trade**, as well as habitat loss.
- The other proposal that was passed was to include the **Tokay gecko** (*Gekko gekko*) in CITES Appendix II, as it faced threats from hunting and collection for use in traditional medicine.
- The CITES is as an **international legally binding agreement** aimed at ensuring “that international trade in specimens of wild animals and plants does not threaten their survival”. However, it does not take the place of national laws.
- The text of the Convention was agreed in Washington, DC, in 1973 and entered into force in 1975. Thus, the convention is sometimes referred to as the **Washington Convention**.

CITES Appendix:

- **Appendix I** includes species “**threatened with extinction**”. Trade in specimens of these species is permitted only in exceptional circumstances.
- **Appendix II** provides a lower level of protection.
- **Appendix III** contains species that are protected in at least one country, which has asked other CITES Parties for assistance in controlling the trade.



<http://www.walkthroughindia.com/wildlife/top-4-rivers-to-spot-3-species-of-otters-in-india/>
https://live.staticflickr.com/4183/34441427301_7c0659509b_b.jpg

**IASBABA'S OPTIONAL
SUBJECT COURSES**

| | |
|--|--|
| OPTIONALS CLASSROOM PROGRAMME | GEOGRAPHY SOCIOLOGY ANTHROPOLOGY POLITICAL SCIENCE KANNADA LIT. |
| TLP OPTIONALS TEST SERIES | GEOGRAPHY SOCIOLOGY ANTHROPOLOGY POLITICAL SCIENCE PUBLIC ADMIN |

INFRASTRUCTURE/ENERGY

Solar energy-KUSUM scheme

Concern:

- The World Bank predicts that around 60% of the aquifers in India will be in a critical state by 2032 if we do not change the current practice of overexploitation of groundwater for irrigation. Large-scale deployment of solar pumps, without a comprehensive plan to monitor and control water usage, is likely to make this prediction a reality

Renewable energy:

- The Ministry of New and Renewable Energy (MNRE) recently rolled out a massive solar-pump programme called **the PM-KUSUM scheme**.
- The scheme has a target to set **up 25,750 megawatts (MW) solar capacity by 2022** to power irrigation pumps, with central financial support of Rs 34,422 crore. It includes installation of 1.75 million off-grid and 1 million on-grid solar pumps as well as 10,000 MW of solar capacity in rural areas through decentralised ground-mounted plants of 0.5 MW to 2 MW capacity. These plants will be used to solarise the rural grid.
- This rapid transition is possible because the scheme makes buying pumps extremely affordable for medium-sized and large farmers. With 30% subsidy from the central and state government each and provision to take bank loans for 30% of the cost, farmers have to sell out only 10% of the cost to buy solar pumps

Positives of the scheme:

- It increases farmers' income in the short term.
- As solar power is cheaper than diesel, in states like Bihar, where farmers largely use diesel pumps, off-grid solar pumps will reduce the cost of irrigation significantly. This will allow farmers to grow more crops, even the water-intensive ones, at a lower cost of cultivation, thereby increasing income.
- In Punjab, where electric pumps dominate and the power subsidy to the agricultural sector is about ₹7000 crore annually, solarisation of agriculture feeders will reduce the subsidy burden significantly.
- Farmers' income will also be augmented by selling electricity from solar plants on to the discoms.
- The most important part of the solar pump is that the solar cycle matches the irrigation cycle. Farmers will get assured irrigation for at least six hours during day time, and they don't have to remain awake at night to irrigate their farms (grid supply is more assured at night in most states).

Negatives of the Scheme:

- Over exploitation of groundwater: a high possibility of overuse of these pumps, leading to groundwater depletion.
- The KUSUM scheme fails to promote efficient irrigation and incorporate explicit and strict measures against groundwater exploitation.
- The scheme only mentions exploring the possibility of its convergence with state-level schemes for promoting the micro-irrigation systems and energy-efficient pumps instead of mandating the same
- In the case of solarisation of agriculture feeders, the implications can be even more disastrous. Currently, states like Punjab and Haryana bear a huge burden of agriculture power subsidy.
- With solar power predicted to be at least 30% cheaper, the subsidy burden is likely to reduce significantly. This means that the state governments have even less incentive to increase agriculture tariff to conserve water when the grid is solarised. Thus, the gross overexploitation of groundwater is likely to continue.

Few points to consider improving the design of the scheme:

- **One**, the central government could push massive irrigation reforms in states through this scheme. For instance, KUSUM should only be extended to states willing to take strong measures to improve irrigation efficiency and control exploitation of groundwater.
- **Two**, it must mandate micro-irrigation for solar pump beneficiaries. Groundwater extraction must be closely monitored and strict mandates on pump size and bore-well depth must be set. Supporting low water-intensive crops in water-scare regions, too, is crucial.
- **Three**, deployment of off-grid solar pumps must be restricted to areas where the grid has not reached and groundwater is abundant. Even in groundwater-abundant areas, off-grid solar pumps must be used for rural electrification or developed into community-based water sale models to maximise utilisation and reduce water wastage.
- **Four**, solarisation of rural feeders should be the preferred solution, given that it is most economical and provides additional income to farmers. However, this should be accompanied by a gradual increase in electricity tariffs, which is crucial to control groundwater exploitation and reduce the burden of agricultural subsidy.
- **Last**, given the central role of discoms, electricity regulators need to ensure that solar pumps and decentralised plants are allowed to evacuate power to the grids easily and payments are made to the farmers regularly.

Conclusion:

- Renewable energy is clean energy, but it doesn't always lead to green solutions. For clean energy to become green, solutions must be comprehensively designed in an integrated manner.

Connecting the dots:

- What is the essence of 'energy conservation' in today's time period? Examine the role of energy in one's life with respect to sustainability of that source
- Discuss the challenges in implementing KUSUM scheme and suggest the measures for the same.

Renewable hybrid energy systems as a game changer

Context:

- India recently conducted two auctions for wind/solar hybrid projects. Both the auctions were under-subscribed, with bids totalling 1.56GW awarded to SB Energy, Adani Green Energy and Renew Power, against a total of 2.4GW on offer.
- Renewable hybrids can play a key role in helping India accelerate the decarbonisation of power generation and lowering the cost of electricity in the medium term.

India has added 65-70GW of wind and solar capacity so far, with wind and solar contributing 9.5% of generated energy in May 2019. If the government target of 175GW is achieved by 2022, this share could exceed 15-16%.

Renewable energy has three inherent challenges

- First, it relies on intermittent sources, producing energy only when the sun is shining or wind is blowing
- Second, its output is constrained to specific hours of the day;
- Third, its use leads to lower utilization of transmission lines. This can create issues in matching peak power demand with renewable output (e.g. in evening hours when solar energy is not available), and raise costs of transmission.

Renewable hybrids can be one solution to the above issues.

- A hybrid system can combine wind, solar with an additional resource of generation or storage.
- Let us take an example: in India, we observe that solar output is maximum between 11am and 3pm, while wind output is highest in late evening and early morning. Peak demand for power is reached in the evening hours of 6-9pm, which cannot be catered to by either wind or solar. If we can store some energy during excess renewable generation hours and release it into the grid during peak demand hours, the combined "hybrid" system can produce 24x7 clean energy in response to varying levels of demand through the day.
- The storage can take many forms, such as batteries, pumped hydro or mechanical storage through flywheels.
- The intermittency of wind and solar could also be balanced by adding a fast ramping source of power; for example, an open cycle gas turbine.
- The overall output of the hybrid system can thus be matched against a required load on an hourly basis. In this way, it can provide both base load and flexible power.

Key notes:

- Hybrid systems are expected to become increasingly cost competitive, driven by reducing costs of battery storage and solar energy.
- India's ministry of new and renewable energy released a solar-wind hybrid policy in 2018. This provides a framework to promote grid-connected hybrid energy through set-ups that would use

land and transmission infrastructure optimally and also manage the variability of renewable resources to some extent.

- India is not the only country planning hybrid projects; 50-plus hybrid projects of MW-scale have already been announced or are under construction globally, with Australia and US being the leaders.
- For larger capacities or longer duration balancing, pumped hydro is a viable storage solution, but is restricted by the lack of suitable physical locations.
- If the economics of hybrid systems do approach the above levels, our analysis indicates that they can potentially be competitive with 30-40% of existing coal-fired stations in India.
- They can therefore become a viable solution to meeting future baseload power requirements, all at zero carbon emissions and future cost-inflation proof.
- Several leading Indian corporates are also showing active interest in increasing their usage of clean power if round-the-clock solutions are available.

Connecting the dots:

1. What policy and regulatory changes need to be made so that India can fully capture the potential of this interesting disruption in the energy sector?
2. Should India continue to build new coal-fired plants to meet base load requirements, or could renewable hybrids take a significant share? Discuss.

[State rooftop solar attractiveness Index \(SARAL\)](#)

In News

- SARAL Index **evaluates Indian states** based on their attractiveness for rooftop development
- It has been designed collaboratively by the Ministry of New and Renewable Energy (MNRE), Shakti Sustainable Energy Foundation (SSEF), Associated Chambers of Commerce and Industry of India (ASSOCHAM) and Ernst & Young (EY).
- SARAL currently captures five key aspects –
 1. Robustness of policy framework
 2. Implementation environment
 3. Investment climate
 4. Consumer experience
 5. Business ecosystem
- The Index would incentivise rooftop solar by creating healthy competition among the States.

Do You know?

- India has set a **target of 175 GW of renewable energy** capacity by 2022, of which 100 GW solar power is to be operational by March 2022, of which **40 GW is expected to come from grid connected solar rooftops.**
- **Karnataka** has been placed at the first rank in SARAL Index. Telangana, Gujarat and Andhra Pradesh have got 2nd, 3rd and 4th rank respectively.

Electric Vehicles

Part of: GS Prelims and GS Mains III – Economy

In News

- **Low-quality Chinese batteries** could slow down India's EV drive
- Chinese government has nudged its battery makers to move up the value chain by recalibrating its subsidy regime.
- China used to provide subsidies to e-scooters with small batteries of short range and with 25kmph speed.
- Now they have stopped the subsidies on those low-technology EVs and are providing subsidies only to high-range, high-density batteries and to EVs with a longer range
- As a result, manufacturers of older models unable to sell their products in their domestic market (China) are exporting their low quality batteries to India
- As **batteries dominate costs of electric vehicles**, some Indian developers tend to buy poor quality Chinese modules to meet cost pressures and timelines.
- This comes against the backdrop of India's **FAME 2** scheme—to expand commercial vehicle fleet—announced with an outlay of ₹10,000 crore in March.
- It is imperative to get cell cost and parameters like energy density (size and weight), lifecycles, safety, temperature tolerance right, so that its batteries are manufactured in India and **suited to Indian conditions**.

Do You know?

- India is currently giving final touches to a plan to build Tesla-style **giga factories** to develop its own domestic battery manufacturing ecosystem.
- This involves a raft of incentives such as concessional financing options, friendly tax regimes and a suitable basic customs duty safeguard
- According to NITI Aayog, India will need six such gigawatt-scale facilities (of 10GWh each) by 2025 and 12 by 2030.
- Besides electric vehicles, such battery storages will cater to electricity grids, given the intermittent nature of electricity from clean energy sources such as solar and wind.

OCEAN ENERGY

Part of: GS Prelims and GS Mains III – Energy Security

In News

- Minister of New and Renewable Energy has approved a proposal to declare ocean energy as Renewable Energy.

- Government has clarified to all stakeholders that energy produced using various forms of **ocean energy** such as tidal, wave and ocean thermal energy conversion will be **considered as Renewable Energy**.
- It will be eligible for meeting the **non-solar Renewable Purchase Obligations (RPO)**.
- The decision will give a boost to ocean energy in the country.
- **Total identified potential of Tidal Energy is about 12455 MW**, with potential locations identified at Khambhat & Kutch regions, and large backwaters, where barrage technology could be used

Do You Know?

- **Tidal Energy:** The tidal cycle occurs every 12 hours due to the gravitational force of the moon. The difference in water height from low tide and high tide is potential energy
- **Current Energy:** Marine current is ocean water moving in one direction. This ocean current is known as the Gulf Stream. Tides also create currents that flow in two directions. Kinetic energy can be captured from the Gulf Stream and other tidal currents with submerged turbines
- **Wave Energy:** Wave energy is generated by the movement of a device either floating on the surface of the ocean or moored to the ocean floor.
- **Ocean Thermal Energy Conversion (OTEC):** It uses ocean temperature differences from the surface to depths lower than 1,000 meters, to extract energy. A temperature difference of only 20°C can yield usable energy.

Giving wings to better air connectivity

Context:

- A cooperative federalism framework can provide the required impetus to the civil aviation sector

Concern:

- Civil aviation is a Central subject and one that barely got significant attention from the States until recently.
- It is evident from the fact that very few States in India have active civil aviation departments.
- This is also due to the reason that States have had a passive role, invariably, having had to look up to the Central government for the development of airports and enhancing air connectivity.

UDAN:

- In the last four years, the situation has changed considerably.
- The cooperation of States is seen as a major factor in the growth of the civil aviation sector. The Regional Connectivity Scheme, Ude Deshka Aam Naagrik (UDAN), has become a game changer as this flagship programme has a built-in mechanism to develop stakes of State governments in the growth of the sector.

Key policy interventions

- Thirty States and Union Territories have already signed memoranda of understanding with the Central government.
- The policies of States and Centre are now being interlinked to make flying accessible and affordable.

Some policy intervention suggestions to jump-start the aviation market:

- **Firstly, For any airline in India, the cost of Aviation Turbine Fuel (ATF) forms about 40% of the total operational cost.**
 - Keeping petroleum products out of the purview of Goods and Services Tax (GST) may be a policy imperative for the State governments but this is a step that adversely impacts the expansion of air services to the States
 - States have very high rates of value-added tax (VAT) on ATF — sometimes as high as 25% — which has dampened the growth trajectory of civil aviation
 - Therefore, relief on ATF is a major incentive for airlines to augment their operations as the airline industry is capital-intensive and works on very thin profit margins.
 - UDAN has motivated State governments to reduce the VAT on ATF to 1% for the flights that are operated under this scheme.
 - Airports such as Jharsuguda (Odisha) and Kolhapur (Maharashtra) have successfully attracted airlines to connect these hitherto unconnected region
 - Reducing VAT on ATF is the biggest lever States can operate, which will enable them in being an equal partner in steering sector policy.
- **Secondly, The second area is in the development and management of airports**
 - There are many regional airports which can be developed by States on their own or in collaboration with the Airports Authority of India (AAI).
 - In this, there have been different models of public-private-partnership which can be leveraged to develop infrastructures.
 - Innovative models can be explored to create viable 'no-frill airports'.
 - These functional airports can open up regions and change the way people travel.
 - India had about 70 airports since Independence until recently.
 - Under UDAN, the Union government, with the help of the States, has operationalised 24 unserved airports over the past two years; 100 more are to be developed in the next five years, which can only be achieved through the active collaboration between willing States and the Centre.
- **Third, States and the Central government can play a crucial role in supporting airlines to develop air services in the remote regions.**
 - To reduce operational cost of airlines and airport operators, incentives from State governments have been sought:
 - some in the form of financial support such as VAT reduction;
 - sharing of viability gap funding with airlines, and
 - non-financial incentives such as providing security and fire services free of cost to airport operators.

- Under the scheme, the Union government has declared concessions on excise duty on ATF and made budgetary allocations for airport development.
- This unique scheme has been successful in encouraging airlines to operate on regional unconnected routes instead of trunk routes.
- Under UDAN, some success stories have motivated States to announce innovative approaches and policies in support of airlines.

Further interventions to be needed:

- Considering the infrastructural constraints and difficult terrain, small aircraft operators need to be encouraged
- Areas which cannot be connected meaningfully by road or rail have to be linked by air
- States may converge their relevant schemes relating to tourism, health, and insurance for supporting air connectivity to supplement the objectives of regional connectivity.
- For this States need to create a conducive business environment to facilitate the strong aspirations of a burgeoning Indian middle class to fly at least once a year. It would boost ticket sales from the present level of eight crore domestic tickets.
- Developing airports, incentivising airlines and pooling resources of both the Union and State governments can accelerate the harmonised growth of the Indian civil aviation sector which would be equitable and inclusive.

Ude Desh ka Aam Naagrik (UDAN) scheme**Key pointers:**

- The Civil Aviation Ministry launched Regional Connectivity Scheme UDAN (Ude Desh ka Aam Nagrik) in 2017.
- UDAN is an innovative scheme to develop the regional aviation market. It is a market-based mechanism in which airlines bid for seat subsidies.
- This first-of-its-kind scheme globally will create affordable yet economically viable and profitable flights on regional routes so that flying becomes affordable to the common man even in small towns.

Connecting the dots:

1. Critically examine the significance of regional connectivity for a developing economy like India. Also discuss the features of the UDAN scheme launched by the government.

SCIENCE AND TECHNOLOGY

Space Commerce

Part of: GS Prelims and Mains GS III – Science and Technology

In News

- **NewSpace India Ltd** launched a formal search for industry consortia which can regularly manufacture and deliver entire PSLV satellite launch vehicles for its parent organisation, ISRO
- NSIL is looking for experienced companies or **consortia to produce the launchers end to end:** their job starts from component procuring, electronics, to large stages and finally the assembly, integration and testing (AIT) of the vehicles
- NSIL is a **public sector space business company** formed in March 2019 to promote Indian space commerce.
- NSIL will initially outsource five PSLVs — Indian rockets that can lift light payloads to ‘low earth orbits’ some 600 km in space.
- The **four-stage PSLV** is needed to place both Indian remote sensing satellites and small satellites of foreign customers to space.
- ISRO currently sources separate rocket parts from around 500 big and small vendors and does the AIT itself at its facilities in Kerala, Tamil Nadu and Andhra Pradesh.
- For almost a decade, **ISRO** has been planning to hand the production over to public and private industries and itself **focus on its core job of space R&D.**

Parker Solar Probe

Part of: GS Prelims and Mains GS III - Science and Technology

In News

- On August 12, **NASA’s** Parker Solar Probe completed a year in service.
- It is part of NASA’s “Living With a Star” programme that explores different aspects of the Sun-Earth system.
- The probe seeks to gather information about the Sun’s atmosphere which will help better understand Sun
- It is also **the closest a human-made object** has ever gone to the Sun.
- The mission’s central aim is to trace how energy and heat move through the Sun’s corona and to study the source of the solar wind’s acceleration.
- The mission is likely to last for seven years during which it will complete 24 orbits

Do You know?

- Arranged in layers, the sun varies in temperature: It is hottest at its center, and cooler in its outer layers — until it strangely reheats at the fringes of the sun's atmosphere (Corona)
- The centre of the Sun: about 15 million kelvin (K).
- Radiative Zone: Temperature falls from about 7 million to about 2 million K across this zone.
- Convection Zone: drops from 2 million K to 5800K in this zone.
- Photosphere: about 5800K, although sunspots are about 3800 K
- Chromosphere: 4300 to 8300 K from inside edge to outside edge
- Corona (outermost layer of the Sun): about 2 million K

[Chimera](#)

Part of: GS Prelims and Mains GS III- Science & Technology

- Chimera is an organism containing a mixture of genetically different tissues, formed by processes such as fusion of early embryos, grafting,

In News

- The **Japanese government** has allowed to conduct human-animal embryo experiments, with the ultimate goal of someday creating organs to be transplanted into humans
- The cutting-edge — but controversial — research involves implanting modified animal embryos with human “induced pluripotent stem” (iPS) cells that can be coaxed into forming the building blocks of any part of the body
- The research involves generating animal embryos — mice, rats or pigs — that lack a particular organ such as a pancreas.
- The modified embryos are then implanted with human iPS cells that can grow into the missing pancreas.
- The embryos would be transplanted into wombs where they could theoretically be carried to term with a functioning human pancreas.

[Genome India initiative](#)

Part of: GS Prelims and Mains GS III – Science & Technology

In News

- The Department of Biotechnology (DBT) plans to scan nearly 20,000 Indian genomes over the next five years, in a two-phase exercise, and develop diagnostic tests that can be used to test for cancer.
- The programme is expected to formally launch in October, with an estimated budget of ₹250-350 crore for the Phase-1.
- The first phase involves sequencing the complete genomes of nearly 10,000 Indians from all corners of the country and capture the biological diversity of India
- In the next phase, about 10,000 “diseased individuals” would have their genomes sequenced.
- This vast data would be compared using machine learning techniques to identify genes that can predict cancer risk and other diseases that could be influenced by genetic anomalies.

- **Agencies involved:** 22 institutions, including those from the Council of Scientific and Industrial Research (CSIR) and the DBT
- However, the data generated would be accessible to researchers anywhere for analysis.
- This would be through a proposed **National Biological Data Centre** envisaged in a policy called the '**Biological Data Storage, Access and Sharing Policy**', which is still in early stages of discussion.

[Reusable Launch System](#)

Part of: GS Prelims and Mains GS III- Science and technology

In News

- Chinese start-up LinkSpace completed its third test of a reusable rocket RLV-T5 in five months, stepping up the pace in the race to develop a technology key to cheap space launches
- The reusable design of its next-generation rocket could lead to a predicted cost reduction of 70% (from \$25 -30 million to \$4.25 million)
- China envisions constellations of commercial satellites that can offer services ranging from high-speed Internet for aircraft and rural areas to tracking coal shipments and commuter traffic.
- LinkSpace's test flight came on the heels of a historic delivery of a satellite into orbit last month by privately owned Chinese firm iSpace.
- SpaceX (US private firm) has already used recoverable rockets on a number of orbital missions since a historic launch early in 2017

Do you know?

- ISRO's Reusable Launch Vehicle - Technology Demonstration Program (**RLV-TD**) is a series of technology demonstration missions that have been considered as a first step towards realizing a **Two Stage To Orbit (TSTO) fully re-usable vehicle**.
- ISRO's TSTO fully re-usable vehicle has different approach from SpaceX & Blue Origin.
 - ISRO's approach to a reusable launch vehicle is a winged body space plane.
 - Whereas SpaceX and Blue Origin are recovering and reusing stages of their existing rockets, in order to reduce launch costs.

[Rooting AI in ethics](#)

Context:

- A technology should be evaluated both on the basis of its utility and the intention of its creator.

We can intuitively recognise whether an action is ethical or not.

Let us look at the theoretical basis of understanding ethics with an example.

- A cigarette company wants to decide on launching a new product, whose primary feature is reduced tar. It plans to tell customers that the lower tar content is a 'healthier' option. This is only half true. In reality, a smoker may have to inhale more frequently from a cigarette with lower tar to get the flavour of a regular cigarette.

Let us analyse this from three dominant ethical perspectives:

- **First, the egoistic perspective states** that we take actions that result in the greatest good for oneself. The cigarette company is likely to sell more cigarettes, assuming that the new product wins over more new customers. From an egoistic perspective, hence, the company should launch the new cigarette.
- **Second, the utilitarian perspective states** that we take actions that result in the greatest good for all. Launching the new cigarette is good for the company. The new brand of cigarette also provides a 'healthier' choice for smokers. And more choice is good for customers. Hence, the company should launch the product.
- The egoistic and utilitarian perspectives together form the 'teleological perspective', where the focus is on the results that achieve the greatest good.
- **Third, the 'deontological perspective'**, on the other hand, focuses more on the intention of the maker than the results. The company deceives the customer when it says that the new cigarette is 'healthier'. Knowingly endangering the health of humans is not an ethical intention. So, the company should not launch this cigarette.

The flawed facial recognition system:

- In the context of Artificial Intelligence (AI), most commercially available AI systems are optimised using the teleological perspectives and not the deontological perspective.

Let us analyse a facial recognition system, a showcase for AI's success.

- An AI system introduced in 2015 with much fanfare in the U.S. failed to recognise faces of African Americans with the same accuracy as those of Caucasian Americans.
- Google, the creator of this AI system, quickly took remedial action. However, from a teleological perspective, this flawed AI system gets a go ahead.
- According to the 2010 census, Caucasian Americans constitute 72.4% of the country's population. So an AI system that identifies Caucasian American faces better is useful for a majority of Internet users in the U.S., and to Google.
- **From a deontological perspective**, the system should have been rejected as its intention probably was not to identify people from all races, which would have been the most ethical aim to have.
- Social media is not the only context where AI facial recognition systems are used today. These systems are increasingly being used for law enforcement. Imagine the implications of being labelled a threat to public safety just because limited data based on one's skin colour was used to train the AI system

Ethical basis of AI

- The ethical basis of AI, for the most part, rests outside the algorithm
- The bias is in the data used to train the algorithm. It stems from our own flawed historical and cultural perspectives — sometimes unconscious — that contaminate the data.
- It is also in the way we frame the social and economic problems that the AI algorithm tries to solve.
- An ethical basis resting on both teleological and deontological perspectives gives us more faith in a system. Sometimes, even an inclusive intention may need careful scrutiny.
- For instance, Polaroid's ID-2 camera, introduced in the 1960s, provided quality photographs of people with darker skin. However, later, reports emerged that the company developed this for use in dompas, an identification document black South Africans were forced to carry during apartheid.

Conclusion:

- Understanding and discussing the ethical basis of AI is important for India. Reports suggest that the NITI Aayog is ready with a ₹7,500 crore plan to invest in building a national capability and infrastructure.
- The transformative capability of AI in India is huge, and must be rooted in an egalitarian ethical basis.
- Any institutional framework for AI should have a multidisciplinary and multi-stakeholder approach, and have an explicit focus on the ethical basis.

Connecting the dots:

1. With great power comes great responsibility. Technology is in itself just a tool; what matters is how we use it." Discuss in the context of AI.
2. Can Artificial Intelligence become a potential threat to economy? Examine.
3. Disputes arising from Artificial Intelligence (AI) use are governed by archaic laws, which do not address issues like data privacy, consumer protection and labour liability. Comment.
4. Means are as important as ends in ethics. Do you agree? Elucidate.

[Akademik Lomonosov](#)

Part of: GS Prelims and GS Mains III – Science & Technology

In News

- Akademik Lomonosov is a **Russian** powership to be operated as the **world's first floating nuclear power station**
- It will be deployed at **Pevek**, in the Chukotka region in **Russia's Far East** and is planned to come online in end of 2019 as the nearby Bilibino Nuclear Power Plant is shut.
- It intends mainly to **serve the region's oil platforms** as Russia is expanding the exploitation of hydrocarbons in the Arctic.

- **Nuclear agency Rosatom** says the reactor is a simpler alternative to building a conventional plant and it intends to sell such reactors abroad.
- Rosatom plans to store spent fuel onboard of ship and thus any accident involving this fuel might have a serious impact on the fragile environment of the Arctic.
- Environmental groups have long warned of the dangers of the project, dubbing it a potential "**Chernobyl on ice**" and a "nuclear Titanic" as it is additionally **vulnerable to storms**

Do You Know?

- **Global warming and melting ice** has made the **Northeast Passage** — which connects the Atlantic Ocean to the Pacific along Russia's northern coast — more accessible.
- The ship was named after Academician Mikhail Lomonosov who was a Russian polymath, scientist and writer in 18th century
- The **Chernobyl disaster** was a nuclear accident that occurred at nuclear reactor in the Chernobyl Nuclear Power Plant, near the city of Pripyat in the north of the **Ukrainian SSR** on April 1986
- It is considered the worst nuclear disaster in history and is one of only two nuclear energy disasters rated at seven—the maximum severity—on the International Nuclear Event Scale, the other being the **2011 Fukushima Daiichi nuclear disaster in Japan**.

Fedor

Part of: GS Prelims and GS Mains III – Science & Technology

In News

- Fedor short for Final Experimental Demonstration Object Research is a **Russian humanoid robot** which has recently reached International Space Station(ISS).
- Fedor weighing 160 kg & standing 180 cm tall, was sent in **an unmanned Soyuz** capsule from the launch pad at Russia's space facility in Baikonur, Kazakhstan.
- It will copy human movements and will help with high-risk tasks at the ISS specially to work on the outside of the ISS
- While Fedor is Russia's first robot in space, in 2011, **NASA sent up Robonaut 2** and in 2013 **Japan** sent up a small robot called **Kirobo** into Space.

Do You Know?

- The International Space Station is habitable artificial satellite in **low Earth orbit**.
- The ISS programme is a joint project between **five participating space agencies**:
 - NASA - USA
 - Roscosmos - Russia
 - JAXA - Japan
 - ESA – Europe
 - CSA – Canada

- The ownership and use of the space station is established by intergovernmental treaties and agreements
- The ISS serves as a **microgravity** and space environment **research laboratory** in which crew members conduct experiments in biology, human biology, physics, astronomy, meteorology, and other fields

Xenotransplantation

Part of: GS Prelims and GS Mains III – Science & Technology

In News

- Xenotransplantation is the transplanting of organs from one species to another
- Pioneering transplant surgeon Sir Terence English, who had performed the first heart transplant in the United Kingdom in 1979, declared that his team would transplant a pig's kidney into a human's body by end of 2019.
- The first attempts at animal-to-human transplants were made in 1838, when the cornea of a pig was transplanted into a human.
- Over the past century there has been unsuccessful attempts to transfer organs from pigs, goats, sheep, monkeys, chimpanzees, baboons and pigs into humans
- With a **lack of human cadavers as donors**, researchers are looking at animal organs as viable **alternative**.
- A **pig's genetic make-up** and internal organs are **similar to a human's**. Its weight, lipids, arterial pressure, heart rate, renal function, electrolyte balance, and digestive system match those in the human body
- **Disadvantage** with xenotransplantation: fear of **transmission of viruses** from animals to humans and **high rejection rate** (human body's immune system starts working against any foreign organ)

Do You Know?

- India's national registry shows 1,945 liver and 7,936 kidney transplants were conducted in 2018.
- However, India needs 1.8-2 lakh kidney transplants every year, as per the Ministry of Health and Family Welfare data.
- In 1997, Dr **Dhani Ram Baruah** attempted pig-to-human heart transplant on a patient in Guwahati who died a week later due to infection. He was held guilty of an unethical procedure, culpable homicide, violation of the Transplantation of Human Organs Act, 1994 and sent to jail.

Sisir Kumar Mitra

Part of: GS Prelims and GS Mains III – Science & Technology

In News

- **Chandrayaan-2** took photos of various craters on the moon while it was flying over its north pole.
- One of the craters it scanned over was a lunar impact **crater named Mitra**, after the noted Indian physicist, Sisir Kumar Mitra
- The Working Group for Planetary System Nomenclature (WGPSN), **an arm of the International Astronomical Union (IAU)** had named the crater after Mitra in 1970.
- Mitra was the first to introduce radio communication in India and was pioneer in the field of **Ionospheric Science** and **Radio Technology**.
- The ionosphere is a region of the **upper atmosphere** which extends from 60 km to several thousand kilometres above the earth.
- Ionosphere **reflects short radio waves**, enabling transmission to be made around the curved surface of the earth by sky waves, and its presence is vital for long-distance radio communication.
- Other Indian scientists who have their names etched on the moon is Dr Vikram Sarabhai.



ONE STOP DESTINATION FOR UPSC
PREPARATION

INTEGRATED LEARNING
PROGRAM (ILP) - 2020
(FRESHERS /WORKING
PROFESSIONALS /
VETERANS)

—
Values added -
BABAPEDIA, MAINSPEDIA, CSAT
Tests, mind maps & many more.

IAS BABA

Still confused?
Reach us at - 090350 77800
Or visit us at - www.iasbaba.com



DISASTER MANAGEMENT

National Crisis Management Committee

Part of: GS Prelims and Mains GS-III Disaster Management

In News

- Recently Cabinet Secretary chairs NCMC meeting to review flood situation in Maharashtra, Karnataka, Kerala and Gujarat.
- At the national level, Cabinet Committee on Security (CCS) and National Crisis Management Committee (NCMC) are the key committees involved in the top-level decision-making wrt Disaster Management (DM).
- NDMC is a **temporary** committee set up in the wake of a natural calamity. Its key function includes
 - Effective coordination and implementation of relief measures and operations.
 - Overseeing the command, control and coordination of the disaster response.
- **Composition** of NDMC:
 - Cabinet Secretary (Chairperson).
 - Secretaries of Ministries / Departments and agencies with specific Disaster management responsibilities

World Youth Conference on Kindness

Part of: GS Prelims and Mains GS-IV - Ethics

In News

- The President of India, Ram Nath Kovind, inaugurated the **first** World Youth Conference on Kindness in **New Delhi** on August 23, 2019.
- The conference is organised by **UNESCO** Mahatma Gandhi Institute of Education for Peace and Sustainable Development (**MGIEP**) and MHRD
- The aim of the conference is to impart critical competencies (i.e. empathy, compassion, mindfulness and critical inquiry) in global youth to inspire, empower and enable them to transform themselves and build long-lasting peace in their communities.
- Youth leaders, representing over 27 countries, are participating in this Conference

Do You Know

- The MGIEP is UNESCO's category 1 Research Institute that focuses on Sustainable Development Goal (SDG) 4.7 towards education for building peaceful and sustainable societies across the world.

- **Vision:** 'Transforming Education for Humanity' – to mainstream Social and Emotional Learning in education systems, innovate digital pedagogies and to put youth as global citizens at the centre of the 2030 agenda for Sustainable Development.

Coalition for Disaster Resilient Infrastructure (CDRI)

Part of: GS Prelims and GS Mains III – Environmental Conservation

In News

- PM Modi will launch an International CDRI during the UN Climate Action Summit in New York on September 23.
- The Coalition's **secretariat** will be set up in **New Delhi**.
- The CDRI will create a mechanism to **assist countries for upgrading their capacities and practices with regard to infrastructure** development in accordance with their risk context and economic needs.
- It will bring together **technical expertise** from a multitude of stakeholders.
- The **charter** of the CDRI will be finalized by **the National Disaster Management Authority** (in consultation with Ministry of External Affairs) after taking inputs from potential member countries
- India will provide support of Rs 480 crore (approx. \$ 70 million) to the CDRI so as to support research projects, setting up secretariat and covering recurring expenditure over a period of five years from 2019 to 2024.
- **Potential:** A clear niche for a Global CDRI would simultaneously address the loss reduction targets under the Sendai Framework, address a number of SDGs and also contribute to climate change adaptation.



IAS BABA

ONE STOP DESTINATION FOR UPSC PREPARATION

INTEGRATED LEARNING PROGRAM

Class room programme

**EVERY ONLINE AND OFFLINE
PROGRAM
OF IAS BABA IS DESIGNED TO SUIT
REQUIREMENTS OF UPSC,
FURTHER, TESTIMONY TO THE ABOVE
HAS BEEN-**

- **60 DAYS PROGRAM**
- **TLP PROGRAM**
- **ILP PROGRAM**
- **200+ SELECTIONS SINCE 2016**
- **82+UPSC CSE 2018 TOPPERS FROM IAS
BABA**

Contact us at - 090350 77800

VISIT US AT - WWW.IASBABA.COM

OR IASBABA -



DEFENCE/INTERNAL SECURITY/SECURITY

Quick reaction surface-to-air missiles (QRSAM)

Part of: GS Prelims and Mains GS III – Security issues

In News

- DRDO successfully flight-tested its state-of-the-art QRSAM against live aerial targets from Integrated Test Range (ITR), Chandipur.
- The all-weather and all-terrain missile, can be mounted on a truck and stored in a canister, is equipped with electronic counter measures against jamming by aircraft radars
- The systems are equipped with indigenously-developed Phased array radar, Inertial Navigation System, Data Link & RF seeker.
- The system is being developed for Indian Army with search and track on move capability with very short reaction time
- QRSAM uses solid-fuel propellant and has a range of 25-30 km

Chief of Defence Staff

Part of: GS Prelims

- PM Narendra Modi announced that government has decided to establish the post of Chief of Defence Staff (CDF) for the three services -- the Indian Army, the Indian Navy and the Indian Air Force.
- CDS is a post that will act as the **single-point advisor to the Government of India**.
- CDS will be in a position to advise on matters related to all the three services -- Army, Navy and Air Force -- thus making **India's armed forces integrated**.
- CDS will be a 'first among equals', a fourth **four-star officer** who will be senior to the three other service chiefs
- The post is aimed at ensuring **better coordination** between the three services.
- The intention is to "reconcile possible differences" in service-specific opinions to enable the government to arrive at considered military decisions.
- The institution of a CDS will also foster inter-services jointness in terms of budgeting, equipment purchases, training, joint doctrines and planning of military operations- necessary for strategizing a robust and **cost-efficient** national defence policy.

Do You know?

- The recommendation for creating the post of CDS was first made after the **1999 Kargil War**.
- A **group of ministers** that was formed in **2001** to explore necessary reforms required to improve India's national security had also favoured creating the post of CDS
- In 2012, the **Naresh Chandra Task Force** recommended that post of a permanent chairman of the Chiefs of Staff Committee (CoSC) should be created.

- The CoSC comprises chiefs of the Indian Army, Indian Navy and the Indian Air Force. The senior-most among them would act as the chairman.

Office of the Chief of Defence Staff

Context:

- In his Independence Day address Thursday, Prime Minister Narendra Modi announced the creation of the post of Chief of Defence Staff to provide “effective leadership at the top level” to the three wings of the armed forces, and to help improve coordination among them.

What is the office of the Chief of Defence Staff (CDS)?

- The CDS is a high military office that oversees and coordinates the working of the three Services, and offers seamless tri-service views and single-point advice to the Executive (in India’s case, to the Prime Minister) on long-term defence planning and management, including manpower, equipment and strategy, and above all, “joints manship” in operations.
- In most democracies, the CDS is seen as being above inter-Service rivalries and the immediate operational preoccupations of the individual military chiefs. The role of the CDS becomes critical in times of conflict.
- Most countries with advanced militaries have such a post, albeit with varying degrees of power and authority. The United States Chairman Joint Chiefs of Staff Committee (CJCS), for example, is extremely powerful, with a legislated mandate and sharply delineated powers.
- He is the most senior military officer and military adviser to the President, and his remit extends to the National Security Council, the Homeland Security Council, and the Defence Secretary.

Why had India not appointed a CDS until now?

- India has had a feeble equivalent known as the Chairman, Chiefs of Staff Committee (CoSC); but this is a toothless office, given the manner in which it is structured.
- The senior most among the three Service Chiefs is appointed to head the CoSC, an office that lapses with the incumbent’s retirement.
- The current Chairman CoSC is Air Chief Marshal Birender Singh Dhanoa, who succeeded the former Chief of the Naval Staff Admiral Sunil Lanba on May 31.
- When ACM Dhanoa retires at the end of September 2019, he would have served as Chairman CoSC for a mere four months.
- In 2015, then Defence Minister Manohar Parrikar had described the CoSC arrangement as “unsatisfactory”, and its Chairman as a “figurehead”.
- The post did not further tri-service integration, resulting in inefficiency and an expensive duplication of assets
- The CoSC system is a leftover from the colonial era, with only minor changes being carried out over the years. Apprehensions in the political class about a powerful military leader, along with inter-Services bickering, have long worked to dis incentivise the upgrade of the post.

Background:

- The first proposal for a CDS came from the 2000 Kargil Review Committee (KRC), which called for a reorganisation of the “entire gamut of national security management and apex decision-making and structure and interface between the Ministry of Defence and the Armed Forces Headquarters”.
- The Group of Ministers Task Force that studied the KRC Report and recommendations proposed to the Cabinet Committee on Security that a CDS, who would be five-star officer, be created.
- In preparation for the post, the government created the Integrated Defence Staff (IDS) in late 2002, which was to eventually serve as the CDS’s Secretariat. However, over the past 17 years, this has remained yet another nebulous department within the military establishment.

But what happened to the proposal?

- No consensus emerged among the Services, with the IAF especially opposed to such a move. The Congress, then in opposition, was against the idea of concentrating too much military power in the CDS’s post.
- The Ministry of Defence (MoD) too, opposed it subtly for the same reasons, and because it could disrupt civil-military ties in the latter’s favour.
- The smaller Air Force and Navy fear that the CDS would be from the Army, by far the largest Service. The IAF has long argued that unlike the United States and other western militaries, the Indian Services are not an expeditionary force, for which a CDS is a necessity.
- The appointment of a CDS would also lead to theatre commands, another aspect that the IAF opposes, fearing a diminution of its operational role.
- In 2011, more than a decade after the KRC Report, the UPA government, led by the Congress, which had opposed the CDS proposal when in opposition, set up the Naresh Chandra Committee on defence and security.
- The 14-member Committee, comprising retired Service Chiefs and other defence experts, suggested a watered-down version of the CDS proposal, in which the Chairman CoSC in the rank of a four-star officer would have a fixed tenure of two years.
- He would have significantly more authority and powers than the Chairman CoSC, and would be a CDS in all but name.

What is the case for having a CDS?

- Although the KRC did not directly recommend a CDS — that came from the GoM — it underlined the need for more coordination among the three Services, which was poor in the initial weeks of the Kargil conflict.
- The KRC Report pointed out that India is the only major democracy where the Armed Forces Headquarters is outside the apex governmental structure. It observed that Service Chiefs devote most of their time to their operational roles, “often resulting in negative results”. Long-term defence planning suffers as day-to-day priorities dominate.
- Also, the Prime Minister and Defence Minister do not have the benefit of the views and expertise of military commanders, in order to ensure that higher level defence management decisions are more consensual and broad based.

- The CDS is also seen as being vital to the creation of “theatre commands”, integrating tri-service assets and personnel like in the US military. India has 17 Service commands at different locations and duplicating assets.
- In 2016, China integrated its military and other police and paramilitaries into five theatres from the earlier seven area commands, each with its own inclusive headquarters, one of which has responsibility for the Indian border. In contrast, India’s border with China is split between the Eastern, Western, and Northern Commands.

What are the arguments against?

- Theoretically, the appointment of a CDS is long overdue, but there appears to be no clear blueprint for the office to ensure its effectiveness. India’s political establishment is seen as being largely ignorant of, or at best indifferent towards, security matters, and hence incapable of ensuring that a CDS works.
- Militaries by nature tend to resist transformation. In the US, the 1986 Goldwater-Nichols Act elevated the Chairman from first among equals to the “principal military advisor” to the President and the Secretary of Defence.
- In the Indian context, critics fear, the absence of foresight and understanding might end up making the CDS just another case of “jobs for the boys”.

Who at present advises India’s Prime Minister on military matters?

- In effect it is the National Security Adviser. This has been especially so after the Defence Planning Committee was created in 2018, with NSA Ajit Doval as its chairman, and the foreign, defence, and expenditure secretaries, and the three Service Chiefs as members.

Connecting the dots:

1. To what extent do you think India needs a chief of defence staff at the apex level to take the responsibility of decision making under critical and necessary conditions.
2. Differentiate between defence forces, paramilitary forces and central armed police forces.
3. Discuss the Pros and Cons for the creation of the post of Chief of Defence Staff?

[Mob lynching](#)

Context:

- Rajasthan’s effort to criminalise mob lynching is a good start
- The Rajasthan government has introduced the Rajasthan Protection From Lynching Bill, 2019. If it gets passed, Rajasthan will be the second State after Manipur to have a dedicated law criminalising mob lynching as a special offence, in addition to other offences under the Indian Penal Code.

What is lynching?

- Lynching is defined as an act or series of acts of violence or aiding, abetting or attempting an act of violence, whether spontaneous or planned, by a mob (two or more persons) on the grounds of religion, race, caste, sex, place of birth, language, dietary practices, sexual orientation, political affiliation and ethnicity.
- Lynching is an egregious manifestation of prejudice, intolerance, and contempt towards the rule of law.
- There have been many incidences of Mob Lynching for issues with respect to cow, children kidnappers, etc and not only common people but also the police personnel became victims of it.
- Some of the cases of mob lynching:
 - 'Go to Pakistan': 20–25 men barge into Gurgaon home, assault family
 - Assam: Mob thrashes man in Biswanath Chariali for allegedly carrying Beef; forced to eat Pork
 - Jharkhand: Old ox dies, mob kills a man, three injured are booked for bovine slaughter
- Amnesty International India documented 721 such incidents between 2015 and 2018.
- Last year alone, it tracked 218 hate crimes, 142 of which were against Dalits, 50 against Muslims, 40 against women, and eight each against Christians, Adivasis, and transgenders.

Causes of mob lynching

- Prejudices in Indian society are age old and deep rooted. These prejudices are based on various identities like race, gender, caste, class, religion, etc.
- Social media or technological advances help in the process of 'confirmation bias' – it is the confirmation of a prejudice or a bias
- The strategic silence of the State and the ineffective law and order machinery has further given legitimacy to mob lynching.
- Lack of digital literacy among common people.
- Political mobilization of fringe groups and Politicization of lynching and strategic silence.

The Supreme Court condemned mob lynching incidents across the country and urged Parliament to enact a law to deal with the crime that threatens rule of law and the country's social fabric.

Supreme Court **in the case of Tehseen Poonawala v Union of India, has provided a 11-point** prescription for preventive, remedial and punitive measures and has asked Parliament to legislate a separate offence for lynching and provide adequate punishment for the same.

- The state governments shall designate a senior police officer in each district for taking measures to prevent incidents of mob violence and lynching.
- The state governments shall immediately identify districts, sub-divisions and villages where instances of lynching and mob violence have been reported in the recent past.
- The nodal officers shall bring to the notice of the DGP any inter-district co-ordination issues for devising a strategy to tackle lynching and mob violence related issues.
- It shall be the duty of every police officer to cause a mob to disperse, which, in his opinion, has a tendency to cause violence in the disguise of vigilantism or otherwise

- Central and the state governments should broadcast on radio and television and other media platforms including the official websites that lynching and mob violence shall invite serious consequence .
- Curb and stop dissemination of irresponsible and explosive messages, videos and other material on various social media platforms. Register FIR under relevant provisions of law against persons who disseminate such messages.
- Ensure that there is no further harassment of the family members of the victims.
- State governments shall prepare a lynching/mob violence victim compensation scheme.
- Cases of lynching and mob violence shall be specifically tried by designated court/fast track courts earmarked for that purpose in each district. The trial shall preferably be concluded within six months.
- To set a stern example in cases of mob violence and lynching, the trial court must ordinarily award maximum sentence upon conviction of the accused person.
- If it is found that a police officer or an officer of the district administration has failed to fulfill his duty, it will be considered as an act of deliberate negligence.

Rajasthan Protection From Lynching Bill, 2019:

- The Bill follows the Supreme Court’s recommendations in authorising the setting up of special courts, appointment of a dedicated nodal officer, and stipulating enhanced punishments.
- its scope is more comprehensive as it not only criminalises acts of lynching, dissemination of ‘offensive material’ and fostering of a ‘hostile environment’, but also provides for relief, legal aid, compensation and rehabilitation.
- some of the Bill’s provisions might attract legal scrutiny. Section 8(c) of the Bill says that whoever commits an act of lynching, where the act leads to the death of the victim, shall be punished with rigorous imprisonment for life and a fine not be less than Rs. 1,00,000 and which may extend to Rs. 5,00,000
- Section 9 of the Rajasthan Bill stipulates, inter alia , the same punishment for lynching and “attempting” an act of lynching.

Conclusion

- Lynching is an egregious manifestation of prejudice, intolerance, and contempt towards the rule of law.
- With all its limitations, the Rajasthan Bill is evidence of political will by the State government. It is expected that deliberations help in the enactment of a more constitutionally robust Bill.
- However, legislation cannot act as a panacea; what is required is political commitment. It is high time that the other States and the Centre show some urgency so that creeping threats are prevented from metastasising into an out-of-control monster

Connecting the dots:

1. For a demographically diverse country such as India, hate crimes are a disaster. Discuss.
2. India is becoming a destination of mob lynching. Is it true? Discuss the causes and what could be the possible solution to stop mob lynching.

J&K and the world

Context:

- India's strategies for internal security, territorial defence and diplomacy will have to act in unison

Concern

- As Pakistan mounts a political offensive against India's decision to alter the status of Jammu and Kashmir, there will surely be international ripples. The Indian diplomatic objective is to get the rest of the world to live with the new reality in Kashmir, if not accept it.

India's diplomacy:

- This is not the first time that India has created new facts on the ground. India's Pokhran tests of 1998 come readily to mind. It took about 10 years for the international system to move from a very harsh initial reaction to lifting by 2008 the four-decade-old nuclear blockade against India.
- India's diplomatic response must be at multiple levels. One is the legal dimension. Realists might scoff at legal niceties. But legal arguments are important and Delhi must present a solid legal brief about its actions, since there is little international understanding of the complex historical evolution of Kashmir.
- Traditionally, Pakistan has been good at mobilising opinion in these quarters, especially in Britain and Europe. India has done quite well in the US over the years, where it has outsmarted separatist propaganda backed by Pakistan.

The question of "Internationalisation":

- Pakistan loves the idea and India deeply resents it. Going to the UNSC has been the instinctive first reaction of Pakistan. But neither Pakistan's faith in the UN nor India's concerns stand up to close scrutiny.
- The UN's ability to impose solutions on disputes between nations has rarely been impressive. But for India taking the Kashmir question to it, there was no way the UN would loom so large on Kashmir.
- Pakistan's proclaimed faith in mediation is touching because there is no evidence that third-party involvement in the Kashmir dispute has benefited Pakistan. **Consider, for example,** Islamabad's efforts to mobilise the international community for mediation in the Kargil War two decades ago. It ended up in the US compelling Pakistan to accept the sanctity of the Line of Control.

Bilateralism is the key to outcomes on the multilateral domain.

Consider the five permanent members of the UNSC.

1. **China** is a party to the dispute on Kashmir twice over. The border between India and China in Ladakh is disputed; China also occupies a piece of Kashmir that Pakistan ceded to it in 1963.

China is certainly part of India's Kashmir problem. China, however, has problems of its own in Hong Kong and Xinjiang. Beijing surely knows that those living in glass houses should not be throwing stones.

2. **Russia**, once upon a time, was India's go-to veto-wielder at the UN on Kashmir. Delhi too has stood by Moscow when it is in some difficulty. In recent times, Russia has drawn closer to China and is often tempted to take "even-handed" positions between India and Pakistan. But dispelling all doubts, Moscow has come out last week in support of India's Kashmir move.
3. Over the last two decades, **France** has emerged as a reliable strategic partner — a sort of "new Russia" for India. In recent years, it has played a key role in the FATF as well as the UNSC on terror-related issues. Delhi can certainly bank on political support from Paris at the current juncture.
4. When it comes to Kashmir and Pakistan, **Britain** is always suspect in Delhi's eyes. There is speculation that London played a key role in facilitating the current US reset on Pakistan. As Britain defines its post-Brexit global strategy, Delhi must encourage London to take into account its long-term interests in India and end its persistent ambiguity on Kashmir.
5. In the end, though, it's really **the US** that has the most important role in shaping the international reaction to the developments in Kashmir. For nearly two years, it's been the relentless pressure from Washington that has forced Pakistan to count the costs of its support for terrorism. And it is the US decision to quit Afghanistan that seems to have emboldened Pakistan to ramp up pressures on Kashmir.

Connecting the dots:

1. Discuss the UNSC members stand on recent developments in Kashmir?
2. Discuss India's strategies for internal security, territorial defence and diplomacy?

[Dixon Plan of 1950](#)

Part of: Mains GS III- Internal Security

In News

- Parliament adopted bill to make Jammu and Kashmir into two UT with carving out of Ladakh from the rest of State
- The idea of dividing J&K into two or more parts traces its origin to the Dixon Plan of 1950
- Owen Dixon, an Australian Jurist chosen by the United Nations to mediate between India and Pakistan on the J&K issue, in his report of September 1950 suggested a package which did not find acceptance from India
- The plan had assigned Ladakh to India and northern areas and Pakistan-occupied Kashmir to Pakistan, besides splitting Jammu into two.
- It has proposed a plebiscite in the Kashmir Valley
- However, B.R.Ambedkar, after quitting as law minister from the Nehru Ministry, had suggested the formation of three zones: the area held by Pakistan, the Valley and Jammu-Ladakh
- Ambedkar had also favoured a plebiscite only in the valley.

Register of Indigenous Inhabitants of Nagaland (RIIN)

In News

- A joint committee of Naga civil society groups has warned the Nagaland government against changing the cut-off date for including people in the RIIN
- The Nagaland government had, through a notification on June 29, 2019, decided to undertake the exercise to update the RIIN with **December 1, 1963, as the cut-off date** for inclusion of people in the register.
- RIIN is a master list of all indigenous inhabitants of the State of Nagaland with the aim of preventing fake indigenous inhabitants' certificates.
- Based on detailed survey, it will have records of indigenous residents from rural and urban areas
- The process will be done as part of the **online system of Inner Line Permit (ILP)**, which is already in force in Nagaland.
- This provisional list will then be collated and published on the government websites by September 11, 2019
- **Unique Identity:** All indigenous inhabitants of Nagaland would be issued a barcoded indigenous inhabitant certificate

Do you know?

- Nagaland was carved out of Assam as a State on December 1, 1963.
- The State government had in April 1977 issued a notification that laid down the criteria for issuing indigenous inhabitant certificates to the residents when the State was formed
- **Inner Line Permit (ILP)** is an official travel document required by Indian citizens residing outside certain "protected" states while entering them.
- ILP's origin dates back to the Bengal Eastern Frontier Regulations, 1873, which protected the British Crown's interest in tea, oil and elephant trade. It prohibited "British subjects" or Indians from entering into these protected areas.
- After Independence, in 1950, the word "British subjects" was replaced by Citizens of India and the focus of the ban on free movement was explained as a **bid to protect tribal cultures in north-eastern India.**

Naga Peace Process

Part of: GS Prelims and Mains GS-II – Issues related to Federalism

In News

- A Naga extremist group (NSCN-IM) has for the first time said a "**separate flag and Constitution**" were necessary for an "honourable solution" to the 22-year-old Naga peace process.

- Centre ended Jammu and Kashmir's special status that allowed it to have its own Constitution and a flag, by **abrogating Article 370** on 5th August 2019
- The Isak-Muivah faction of the National Socialist Council of Nagaland (NSCN-IM) had signed a **Framework Agreement** with Union Government on August **2015**.

Do You Know

- The peace process began when NSCN-IM announced cease fire in 1997 and framework agreement was believed to have taken that process to a critical stage. However, both the Centre & the outfit **has not divulged the contents of the agreement**
- The **Khaplang faction of the NSCN** ceased to be a part of the peace process after it walked out of a 14-year-old truce in March 2015.
- The Khaplang faction is primarily based in Myanmar while most of the leaders and **cadres of the Isak-Muivah group are from Manipur**.
- The Centre had a year ago insisted that the peace process would be incomplete if **at least six other Naga extremist groups**, some of whom are dormant, were not taken on board the negotiations.

Chasing peace in Nagaland

Context:

- More than three years ago, the government led by Prime Minister Narendra Modi had announced with much fanfare the signing of a historic framework agreement to end the Naga insurgency, which is often termed as the mother of all insurgencies in India.

Concern:

- Lasting peace in the Northeast is not possible without resolving the Naga insurgency

Framework Agreement:

- The framework agreement was signed between the Central government and the Naga Groups led by the National Socialist Council of Nagaland- Isak- Muivah (NSCN-IM).
- The central government accepted the uniqueness of Naga history and culture and primacy of the Indian Constitution was accepted by the NSCN-IM.
- Earlier the objective of Naga group was to establish an independent sovereign state for the Naga community but now the demand has been limited to the creation of a Greater Nagalim with the integration of the Naga-inhabited areas of Assam, Manipur and Arunachal Pradesh

Key notes:

- Shillong Accord, 1975: The Naga National Council (NNC) led by Angami Zapu Phizo accepted the Indian Constitution. NNC was formed in 1946 to hold the Naga community and their interest together.
- NSCN, 1980: to oppose the decision of NNC to accept Indian Constitution, Maoist guerilla leaders Isak Chisi Swu, Thuingaleng Muivah, and SS Khaplang created NSCN in 1980. Later after

the differences between the leaders, in 1988, the group split into the NSCN-IM and the NSCN-K. After the death of Phizo in 1991, the NSCN-IM came to be recognized as the voice of Naga assertion.

- The ceasefire agreement, 1997: Govt. of India and NSCN-IM signed a ceasefire agreement which started the peace talks with resolving the conflict but the demand of the group insisted on a separate flag as well as the inclusion of all Naga-inhabited areas in one administration became a roadblock in the peace talks.
- Later in 2015, the framework agreement was signed.

Significance of the agreement:

- First-time NSCN-IM wipes out its demand for attaining sovereignty for Nagas from India.
- The agreement has started the peace talks between the government and the groups. The agreement shifts the nature of the group who prefer violence as a method to achieve their aims as now the groups are regularly held consultations with the government.
- The agreement will strengthen the security of India as the agreement will provide maximum sovereignty to the Nagas to grow.
- The agreement would generate more trusts among Nagas.

Criticisms of the agreement:

- Though the agreement was signed three years ago there is no progress since then.
- The agreement is a secretive agreement as the provisions of the agreements have not been disclosed by the government which makes the rebel groups more active.
- The agreement has failed to address the illegal activities of NSCN-IM.
- The demand for autonomy to Nagas in other states i.e. Assam, Manipur, and Arunachal Pradesh will be a threat to integrity.
- Special arrangement for Nagas as per Article 371 and similar concessions are expected by Manipur also as the Naga insurgency is linked with Manipur insurgency where the Nagas are more active.
- The agreement does not address other important issues like the demand of Separate 'flag', non-codification of Naga customary law.
- Politically unviable to accept this demand even though the Centre has agreed to guarantee the protection of the Naga identity.
- The non-Nagas and other ethnic groups may be tempted to demand a similar arrangement

Conclusion:

Lasting peace in the Northeast is not possible without resolving the Naga insurgency, which had also lent some form of support to other disaffected elements in the region from time to time. However, given the complexities involved, there is no easy solution. In other words, any pronouncement about the Naga accord needs to be taken with a pinch of salt.

Privacy no longer supreme

Context:

- Two years ago, this month, a nine-judge bench of the Supreme Court unanimously held that Indians have a constitutionally protected fundamental right to privacy.

What the judgement said?

- It held that privacy is a natural right that inheres in all natural persons, and that the right may be restricted only by state action that passes each of the three tests:
- First, such state action must have a legislative mandate;
- Second, it must be pursuing a legitimate state purpose;
- Third, it must be proportionate i.e., such state action — both in its nature and extent, must be necessary in a democratic society and the action ought to be the least intrusive of the available alternatives to accomplish the ends.

Prescribing a higher standard

- Judgment in Justice K.S. Puttaswamy (Retd) vs Union Of India fundamentally changed the way in which the government viewed its citizens' privacy, both in practice and prescription.
- It undertook structural reforms and brought transparency and openness in the process of commissioning and executing its surveillance projects, and built a mechanism of judicial oversight over surveillance requests.
- It demonstrated great care and sensitivity in dealing with personal information of its citizens.
- It legislated a transformative, rights-oriented data protection law that held all powerful entities that deal with citizens' personal data (data controllers), including the state, accountable.

Data protection law

- The data protection law embodied the principle that the state must be a model data controller and prescribed a higher standard of observance for the state.
- The law also recognised and proscribed the practice of making access to essential services contingent on the citizen parting with irrelevant personal information.
- This law established an effective privacy commission that is tasked with enforcing, protecting and fulfilling the fundamental right to privacy implemented through the specific rights under the legislation.
- The data protection law also revolutionised the technology sector landscape in the country, paving way for innovative privacy-aware and privacy-preserving technical solution providers to thrive and flourish, and establishing the country as a global leader in the space.
- The judgment in K.S. Puttaswamy effected little change in the government's thinking or practice as it related to privacy and the personal data of its citizens.

Data use vs. privacy

- The government has shunned a rights-oriented approach in the collection, storage and processing of personal data and has stuck to its 'public good' and 'data is the new oil' discourse.

- In other words, personal data in the custody of the state is for the state to use, monetise and exploit in any manner it desires so long as it guards against security incidents such as breaches and unauthorised access — i.e. unauthorised by the government.
- This convenient redux of the idea of privacy to mere information security appears to inform all its policies

Justice Sri krishna committee :

- The committee published the draft Personal Data Protection Bill uses a similar language of ‘free and fair digital economy’, with the digital economy being the ends and the notion of privacy merely being a shaper of the means – not only misrepresenting the purpose of the bill, but also its history and the mischief that it intended to tackle.
- The committee made the choices it made despite being aware that the courts are likely to interpret every provision of the legislation purposively, taking note that the purpose is couched in terms of the economy as opposed to the bill having a singular focus on the fulfilment of the right to privacy.

Conclusion:

- K.S. Puttaswamy ages and steps into its third year, the script is still on the table. A rights-oriented data protection legislation — which includes comprehensive surveillance reform prohibiting mass surveillance and institution of a judicial oversight mechanism for targeted surveillance — and which recognises the principle that the state ought to be a model data controller as it deals with its citizens’ personal information; is still possible, one hopes.

Connecting the dots:

1. India does not have a legal architecture to deal with data theft and compromise issues. Do you agree? What are the challenges regarding data protection and how can they be addressed?
2. Data security has assumed significant importance in the digitized world due to rising cybercrimes. The justice B.N Srikrishna Committee Report addresses issues related to data security. What, in your view, are the strengths and weaknesses of the Report relating the protection of personal data in cyberspace?
3. Data protection is one of the key elements for a robust cyber policy. Analyse.

MISCELLANEOUS

| In News | Description |
|----------------------|--|
| 1. Happiness Classes | <p>In News</p> <ul style="list-style-type: none"> • ‘Happiness Utsav ’was organised by the Delhi government to celebrate a year since the launch of happiness classes in Delhi government schools. • “Without happiness, education can never be complete.” CJI Ranjan Gogoi said while speaking at the concluding ceremony • Happiness classes in schools is need of the hour as India’s position on the World Happiness Index has dropped from 118 to 140 • WHI is an annual publication of the United Nations Sustainable Development Solutions Network. • Four states -Manipur, Madhya Pradesh, Puducherry and Nagaland – have planned to replicate Delhi’s Happiness classes in their state-run schools. |
| 2. Bharat Ratna | <p>In News</p> <ul style="list-style-type: none"> • The President of India presented Bharat Ratna Awards to Nanaji Deshmukh (posthumously), Bhupendra Kumar Hazarika (posthumously) and Pranab Mukherjee • The Bharat Ratna is the highest civilian award of the Republic of India. Bharat Ratna recipients rank seventh in the Indian order of precedence • The award was instituted in 1954 • The first recipients of the Bharat Ratna were C. Rajagopalachari, Sarvepalli Radhakrishnan, and C. V. Raman, who were honoured in 1954. • The award is conferred in recognition of exceptional service/performance of the highest order in "any field of human endeavour". • The award was originally limited to achievements in the arts, literature, science, and public services, but this was changed in 2011. • Though usually conferred on India-born citizens, the Bharat Ratna has been awarded to one naturalised citizen, Mother Teresa, and to two non-Indians, Pakistan national Khan Abdul Ghaffar Khan and former South African President Nelson Mandela. • There is no formal nomination process. The recommendations for the award can only be made by the Prime Minister to the President. • A maximum of three nominees can be awarded per year. • Recipients receive a certificate signed by the President and a medal. There is no monetary grant associated with the award. |
| 3. Virasat-e-Khalsa | <p>In News</p> <ul style="list-style-type: none"> • The Virasat-e-Khalsa museum is set to find a place in Asia Book of Records for becoming the most visited museum in the Asian sub- |

| | |
|---------|---|
| | <p>continent on a single day.</p> <ul style="list-style-type: none"> • Virasat-e-Khalsa was built to commemorate the rich history and culture of Punjab and Sikhism. • It was inaugurated in 2011 and located in Anandpur Sahib town in Punjab • This would be the third entry for the museum in record books. Earlier, Virasat-e-Khalsa made it to Limca Book of Records in the February 2019 edition and India Book of Records. |
| 4. Lucy | <p>In News</p> <ul style="list-style-type: none"> • A 3.8-million-year-old skull named MRD was discovered at a palaeontological site in Ethiopia in 2016 • Research on MRD could now clarify the origins of Lucy, the well-known ancestor of modern humans which is estimated to be 3.2 million years old. • The finding helps bridge a big gap between the earliest-known human ancestors (about 6 million years old) and species like Lucy. • The dating suggests that MRD's species could have coexisted with Lucy's for some 100,000 years. • It is possible that a small group of MRD's species became genetically isolated from the rest of the population and evolved into Lucy's species, whose population eventually out-bred MRD's species <p>Do You know?</p> <ul style="list-style-type: none"> • The age of MRD was determined by dating minerals in layers of volcanic rocks near the site. • Researchers also combined field observations with analysis of microscopic biological remains to reconstruct the landscape, vegetation, and hydrology in the area where MRD died, • Scientists have reconstructed MRD's facial features and described him as "a mix of primitive and derived facial and cranial features" |

(TEST YOUR KNOWLEDGE)

Model questions: (Answers are provided at the end)

Q.1) Consider the following statement about Equalization levy

1. It is an indirect tax on payments made by residents to non-resident companies for online advertisement services provided in India
2. Indian start-ups and SMEs are required to deposit 6% equalisation levy on behalf of these foreign companies which leads to additional compliance
3. These start-ups and SMES are able to claim Input Tax Credit for this cost incurred

Which of the statement(s) given above is/are correct?

- a) 1 and 2 only
- b) 2 only
- c) 2 and 3 only
- d) 1,2 and 3

Q.2) World Happiness Index is brought out by which of the following organisation?

- a) World Economic forum
- b) World Bank
- c) Bill and Melinda Gates Foundation
- d) UN Sustainable Development Solutions Network

Q.3) Consider the following statements.

1. Article 280 of the constitution empowers the Parliament to make laws for the adjudication of inter-state water dispute.
2. National Water Informatics centre was setup in 2018 as a single window source of updated data on water resources

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.4) Which of the following states has a serious conflict on the sharing of waters of the Vansadhara Water Disputes?

- a) Andhra Pradesh and Odisha
- b) Andhra Pradesh and Telangana
- c) Maharashtra and Madhya Pradesh
- d) Karnataka and Telangana

Q.5) Consider the following statements

1. The Bill becomes an act only after the President has given assent to it
2. The President can give assent or withhold assent to a Constitutional Amendment Bill
3. The enactment of ex-post-fact laws (having retrospective effect) is prohibited only on Criminal laws and Tax laws and not on civil laws.

Which of the statement(s) given above is/are incorrect?

- a) 1 and 2 only
- b) 2 only
- c) 2 and 3 only
- d) 1,2 and 3

Q.6) Consider the following statements about National Medical Commission(NMC)

1. NMC will replace the Medical Council of India
 2. NMC has the power to regulate the fees of 50% of seats in private medical colleges
 3. NMC is purely a Central body with no representation from States
2. Only existing institutions are given the status of IOE
 3. All the 20 IOC will get Rs 1000 crore each from HRD ministry to achieve world class status

Which of the statement(s) given above is/are correct?

- a) 1 and 2 only
- b) 1 only
- c) 2 and 3 only
- d) 1,2 and 3

Q.7) Consider the following statements.

1. Stem cells are basic cells that can become almost any type of cell in the body
2. Induced pluripotent stem cells (iPSCs) are adult cells that have been genetically reprogrammed to an embryonic stem cell-like state
3. Recently UK government has allowed researchers to implant human iPSCs into animal embryos with aim to develop human organs

Which of the statement(s) given above is / are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2, and 3

Q.8) Consider the following statements about Institutes of Eminence (IOE)

1. The IOE will enjoy greater autonomy in terms of deciding their fee structure and course duration & structure

Which of the statement(s) given above is/are incorrect?

- a) 1 and 2 only
- b) 2 only
- c) 2 and 3 only
- d) 1,2 and 3

Q.9) Consider the following statements about Census

1. It is a decennial exercise carried out by Office of the Registrar General & Census Commissioner, India
2. Every citizen is compelled by law to participate in the exercise and denial could lead to criminal action
3. Socio-Economic Caste Census -2011 was conducted by Ministry of Home Affairs

Which of the statement(s) given above is/are correct?

- a) 1 and 2 only
- b) 1 and 3 only
- c) 2 and 3 only
- d) 1,2 and 3

Q.10) Consider the following statements about Khanij Bidesh India Limited(KABIL)

1. It has been set up as subsidiary of National Mineral Development Corporation of India, a Navaratna company
2. Its objective is to ensure supply of critical and strategic Minerals to Indian domestic market

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.11) One Nation One ration card scheme is being implemented by which Union Ministry?

- a) Ministry of electronics and information technology
- b) Ministry of Consumer Affairs, Food & Public Distribution
- c) Ministry of Food Processing Industries
- d) Ministry of Rural Development

Q.12) Consider the following statements about Quick reaction surface-to-air missiles (QRSAM)

1. It is being jointly developed by India and Israel
2. The system is being developed for Indian Army with search and track on move capability with very short reaction time
3. QRSAM uses solid-fuel propellant and has a range of 250-300 km

Which of the statement(s) given above is/are correct?

- a) 1 and 2 only
- b) 2 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.13) Consider the following statements about Genome India Initiative

3. 22 institutions, including those from CSIR and Department of Biotechnology is involved in this initiative
4. The data generated from this initiative would be accessible to researchers anywhere for analysis through National Biological Data Centre

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.14) Consider the following statements about Surrogacy

1. Surrogacy is a process of fertilisation where an egg is combined with sperm outside the body, in laboratory conditions
2. Recently a bill has been passed in Lok Sabha which provides for blanket ban on Surrogacy in India

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.15) Consider the following statements

1. India's resource extraction of 1580 tonnes/acre is much higher than the world average of 450 tonnes/acre, while material productivity remains low.
2. The country's recycling rate is just about 20-25% compared with 70% in developing countries in Europe.

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.16) Which state has launched Resource Assistance for Colleges with Excellence (RACE) for distribution of faculties and movable assets among the government colleges ?

- a) Delhi
- b) Rajasthan
- c) Madhya Pradesh
- d) Kerala

Q.17) Consider the following statements

1. Abortion is illegal in India
2. Abortion deaths constitute 8% of all maternal deaths per year in India.
3. Presently, woman must seek legal recourse if the pregnancy has gone over 20 weeks to terminate the pregnancy

Which of the statement(s) given above is / are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.18) Consider the following statements about Consumer Protection Bill, 2019

1. The Central Consumer Protection Authority (CCPA) proposed under the bill can initiate class action, including enforcing recall, refund and return of products.

2. However, the bill falls short as it does not have provision for Mediation and e-filing of cases

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.19) Consider the following statements

1. Coal-fired power plants in India have to ensure that they curtail sulphur dioxide and nitrous oxide emissions by 2022 through adoption of clean technologies
2. India's installed power capacity as of March 2019 is 100,000 MW.

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.20) Consider the following statements

1. Researchers from Mexico have created a biodegradable plastic from the juice of the prickly pear cactus
2. The new material begins to break down after sitting in the soil for a month and when left in water, it breaks down in a matter of days
3. The new biodegradable plastic uses only 30% crude oil inputs unlike traditional plastics which are made from 100% crude oil

Which of the statement(s) given above is / are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.21) The remains of a super-sized parrot named *Heracles inexpectatus* has been recovered in which country?

- a) Australia
- b) Central African Republic
- c) Madagascar
- d) New Zealand

Q.22) Consider the following statements about National Water Development Agency

1. It is a statutory body set up under the River Boards Act, 1956
2. Recently it has released report which proposes to divert water from the Godavari, through the Krishna river, to the Pennar basin.

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.23) Consider the following statements about Environmental and Social Management Framework (ESMF)

1. The framework will dictate how prospective infrastructure projects situated along the coast ought to be assessed before they can apply for clearance.
2. It was prepared by the Society for Integrated Coastal Management, an Environment Ministry-affiliated body.

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.24) Consider the following statements

1. Bharat Ratna awards were instituted in 1954 and the first recipients were Dr B.R.Ambedkar, Sardar Patel and Jawaharlal Nehru
2. Recipients receive a certificate signed by the President, a medal and monetary grant of 25 Lakh rupees.

Which of the statement(s) given above is / are incorrect?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.25) Dixon Plan of 1950 was associated with which of the following ?

- a) Israel-Palestine conflict
- b) USA's plan to reconstruct Europe through provision of aid
- c) North Korea and South Korea conflict
- d) Kashmir conflict

Q.26) Which of the following countries have eliminated Measles

1. Sri Lanka
2. Bhutan
3. Nepal
4. India

5. Timor-leste

Select the correct answer from the codes given below?

- a) 1,2 and 3 only
- b) 1,2,4 and 5only
- c) 1,2 and 4 only
- d) 1,2 and 5 only

Q.27) Consider the following statements about Tuberculosis (TB)

- 1. It is caused by plasmodium parasite
- 2. India has the largest number of multidrug resistant TB cases

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.28) Consider the following statements about National Crisis Management Committee

- 1. It is a statutory body established under Disaster Management Act, 2005
- 2. Its function includes overseeing the command, control and coordination of the disaster response.
- 3. It is headed by Prime Minister

Which of the statement(s) given above is / are incorrect?

- a) 1 only
- b) 3 only
- c) 2 and 3 only
- d) 1 and 3 only

Q.29) Consider the following statements about Prevention of Money Laundering Act

- 1. The Enforcement Directorate (ED) officers are empowered to arrest an accused without warrant, subject to certain conditions.
- 2. There is pre-requisite of an FIR or chargesheet by other authorized agencies, for ED officers to begin investigation into any money laundering cases

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.30) Consider the following statements about Sex Ratio at Birth (SRB)

- 1. It is defined as the number of female births per 1 lakh male births
- 2. Sikkim has the lowest SRB as per National Family Health Survey –IV, 2015-16
- 3. The highest improvement of SRB (between 2005-06 and 2015-16) was in Punjab

Which of the statement(s) given above is / are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.31) Consider the following statements about Article 371F

1. It is a special provision to protect the rights and interests of various sections of the population of Nagaland
 2. It is introduced by 52nd Constitutional Amendment Act, 1985
- a) 1,2 and 3 only
 - b) 2,3 and 4 only
 - c) 1,2 and 3 only
 - d) 1,2,3 and 4

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.32) Consider the following statements

1. Farm equipment like laser-guided land leveller, happy seeder and solar driers can save precious groundwater and increase productivity by 10 to 15%
2. Ministry of Rural development plans to launch app to aid farmers where expensive agricultural equipment can be hired through the mobile application

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.33) Uranium deposits are located at which among the following places in India

1. Mahadek Basin in Meghalaya
2. Singhbhum belt in Jharkhand
3. Bhima basin in Karnataka
4. Aravallis in Rajasthan

Select the correct answer from the codes given below.

Q.34) Consider the following statements about Reusable Launch System

1. The system could reduce the cost of launching satellites by nearly 70%
2. ISRO has already used recoverable rockets on a number of orbital missions like Mangalyaan and Mission Shakti

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.35) Kajin Sara lake is located in which country?

- a) India
- b) Nepal
- c) Bhutan
- d) Pakistan

Q.36) Consider the following statements about Permafrost

1. It is frozen soil, rock and plant material remaining below 0°C for at least two decades.
2. As permafrost thaws, microbes decompose organic material releasing Carbon dioxide and methane into atmosphere

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.37) Consider the following statements about Tardigrades

1. Tardigrades are a phylum of water-dwelling eight-legged segmented micro-animals commonly known as water bears or moss piglets
2. They are rapidly disappearing from earth due to global warming as they are sensitive to temperature changes

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.38) Udanti Wildlife Sanctuary is located in which State of India?

- a) Orissa
- b) Madhya Pradesh
- c) Jharkhand
- d) Chhattisgarh

Q.39) Consider the following statements about Pradhan Mantri Jan Arogya Yojana under Ayushman Bharat Yojana

1. The scheme provides insurance coverage of up to ₹5 lakh per family per year for secondary and tertiary care hospitalisation
2. It is a Central Sector Scheme with 100% contribution from Centre

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.40) Consider the following statements about Perseids Meteor shower

3. They occur every year during December
4. The meteor shower appears as the Earth passes through the cosmic dust left by the comet Swift-Tuttle.
5. They are visible in the Northern Hemisphere and can be viewed in skies all across.

Which of the statement(s) given above is / are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.41) Consider the following statements

1. Reverse repo Rate is the rate at which the RBI lends money to commercial banks
2. Repo-linked deposit and lending rates will bring transparency in bank rates and leads to quick transmission of monetary policy rate cuts.
3. Decrease in bank deposit rate will lead to increase in formalisation of economy

Which of the statement(s) given above is / are incorrect?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.42) Consider the following statements about Regulatory sandbox

1. It refers to live testing of new products or services in a controlled/test regulatory environment for which regulators may permit certain regulatory relaxations for the limited purpose of the testing
2. RBI will launch the sandbox for entities involved in money transfer services, digital know-your customer, crypto currency, credit registry and credit information.

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.43) Injeti Srinivas Committee appointed by Union Government deals with which of the following issues?

- a) Recapitalization of Public Sector banks
- b) Economic Capital Framework for RBI
- c) Cryptocurrency
- d) Reviewing of Corporate Social Responsibility

Q.44) Inner Line Permit is operational in which of the following states

1. Mizoram
2. Nagaland
3. Manipur
4. Arunachal Pradesh
5. Tripura

Select the correct answer from the codes given below

- a) 1,2 and 3 only
- b) 1,2,4 and 5 only
- c) 1,2 and 4 only
- d) 1,2,3,4 and 5

Q.45) Consider the following statements about Register of Indigenous Inhabitants of Nagaland (RIIN)

1. RIIN is a master list of all indigenous inhabitants of the State of Nagaland with the aim of preventing fake indigenous inhabitants' certificates.
2. The list was published when the state of Nagaland was carved out of Assam in 1963

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.46) Consider the following statements

1. Groundwater is the source of 40% of India's water needs
2. More than 90% of the rice-wheat areas in north-west India are irrigated using groundwater.
3. Consecutive years of weak monsoons, massive deforestation, poor rainwater harvesting and pollution of rivers and lakes have led the country to depend on groundwater.

Which of the statement(s) given above is / are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only

d) 1,2 and 3

Q.47) Consider the following statements about Competition Law Review Committee constituted in October 2018

1. The Committee was chaired by Bimal Jalan
2. The committee proposes introducing a dedicated bench in NCLAT for hearing appeals under the Competition Act
3. The committee also proposes opening of CCI offices in every state to carry out non-adjudicatory functions such as research, advocacy etc. and interaction with State Governments and State regulators.

Which of the statement(s) given above is / are incorrect?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.48) Consider the following statements about Document Identification Number

1. It is an initiative of GST Council
2. It will bring greater transparency in the functioning of the tax-administration and improvement in service delivery

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.49) Consider the following statements

1. Tiny pieces of plastic (shreds less than 5mm in length) are found in Arctic snow
2. The presence of microplastics in such places suggests that they are being carried around the planet in atmospheric winds, and that we're breathing them in.

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.50) Consider the following statements about New Space India Ltd (NSIL)

1. NSIL is a public sector space business company formed in 1992 to promote Indian space commerce.
2. Its parent organisation is ISRO
3. NSIL is planning to outsource production of PSLVs to private players

Which of the statement(s) given above is / are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.51) Consider the following statements about National Essential Diagnostic List (NEDL)

1. India has become the first country to compile such a list
2. NEDL will lead to effective assessment of disease burden, disease trend and helps address antimicrobial resistance crisis too.

Which of the statement(s) given above is / are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.52) Consider the following statements

1. Total Fertility Rate (TFR), defined as the number of children born to a woman until the end of her child-bearing age
2. The latest data show that TFR in India has dropped from 2.3 to 2.2.
3. The replacement fertility rate for India is 1.9.

Which of the statement(s) given above is / are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.53) Know India Programme is organised by which Union Ministry?

- a) Ministry of Human Resource Development
- b) Ministry of Culture
- c) Ministry of External Affairs
- d) Ministry of Home Affairs

Q.54) Consider the following statements about Geographical Indication Tag

1. GI is an indication used on products that have a specific geographical origin and possess qualities or a reputation that are due to that origin.
2. GI products can benefit the rural economy in remote areas, by

supplementing the incomes of artisans, farmers, weavers and craftsmen.

3. Palani Panchamirtham is the first temple 'prasadam' in India to have been bestowed with the GI tag.

Which of the statements given above are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.55) Mangdechhu hydroelectric power plant is located in which country?

- a) India
- b) Nepal
- c) Bhutan
- d) Bangladesh

Q.56) Strait of Gibraltar connects which two water bodies ?

1. Atlantic Ocean
2. Pacific Ocean
3. Mediterranean Sea
4. Red Sea

Select the correct answers from the codes given below.

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 2 and 4 only

Q.57) Consider the following statements

Assertion (A): India is the largest emitter of sulphur dioxide in the world

Reason (R): India does not have sulphur dioxide emission limits for coal-fired power plants.

Select the correct answer from the codes given below?

- a) Both A and R are true and R is the correct explanation for A
- b) Both A and R are true but R is not the correct explanation of A
- c) A is true but R is false.
- d) A is false but R is true.

Q.58) Consider the following statements

1. Nearly half of all States in India have legislative Council
2. Under Article 169, President has the power to create or abolish Legislative Council

Which of the statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.59) Consider the following statements about Parker Solar Probe

1. It is launched by NASA as part of "Living With a Star" programme
2. It is the closest a human-made object has ever gone to the Sun
3. The mission's central aim is to trace how energy and heat move through the Sun's corona

Which of the statement(s) given above is/are correct?

- a) 1 and 2 only
- b) 2 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.60) In which case did Supreme Court ruled unanimously that privacy is a constitutionally protected right in India?

- a) K.S.Puttaswamy v Union of India.
- b) Kesavananda Bharati Vs State of Kerala.
- c) Indira Sawhney & Ors v. Union of India.
- d) None of the above

Q.61) Pretomanid, bedaquiline and linezolid often seen in the news is related to which of the following?

- a) News vaccines for Malaria
- b) Banned drugs used in Poultry industry
- c) Treatment of drug resistant Tuberculosis
- d) None of the above

Q.62) FAME India scheme is being implemented by which Union Ministry?

- a) Prime Minister's Office
- b) Ministry of Road Transport and Highways
- c) Ministry of Heavy Industries & Public Enterprises
- d) Ministry of Electronics and IT

Q.63) Palasava recently seen in news is associated with which of the following fields?

- a) Fibre crop grown in Manipur which got GI tag recently
- b) Ancient Ayurveda medicine found to be useful in cancer research
- c) Village in Kutch area where fossils have been discovered
- d) None of the above

Q.64) State rooftop solar attractiveness Index (SARAL) is designed by which body/organisation?

- a) NITI Aayog

- b) The Energy and Research Institute (TERI)
- c) Ministry of Power
- d) None of the above

- 2. The One Nation One Ration Card scheme helps the beneficiary to buy food grains from ration shops located in any part of the country

Q.65) NISHTHA scheme is being implemented by which Union Ministry?

- a) Ministry of Minority Affairs
- b) Ministry of Women and Child development
- c) Ministry of Human Resources development
- d) Ministry of Skill Development and Entrepreneurship

Which of the above statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.66) Consider the following statements with regard to Amazon Rainforest

- 1. The Amazon rainforest produces approximately 20% of oxygen in the Earth's atmosphere
- 2. The largest rainforest in the world, the Amazon is a vital carbon store that slows down the pace of global warming.
- 3. Wildfires in amazon forests have decreased by 44% compared to the same period last year due to el-nino effect.

- 1. The two main components of the scheme are dispute resolution and amnesty
- 2. The scheme aimed at reducing tax litigation will be operationalised from September 1, 2019 till March 31, 2020.

Which of the above statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Which of the statements given above are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.69) Consider the following statements with regard to Composite Water Management Index 2.0

Q.67) Consider the following statements

- 1. The responsibility of identifying eligible families and issuing ration cards to them rests with Panchayats/Urban Local bodies

- 1. It is conceptualised and prepared by Ministry of Jal Shakti
- 2. Karnataka had topped the Index
- 3. 80% of states assessed on the Index over the last three years have shown improvement in water management scores

Which of the statements given above are incorrect?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.70) Consider the following statements about World Youth Conference

1. The third edition of the conference was recently inaugurated by President Ram Nath Kovind in New Delhi
2. The conference is organised by UNESCO Mahatma Gandhi Institute of Education for Peace and Sustainable Development and MHRD
3. The aim of the conference is to impart critical competencies like empathy, compassion, mindfulness and critical inquiry in global youth

Which of the above statement(s) given above is/are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.71) Consider the following statements with regard to Financial Action Task Force

1. FATF is an intergovernmental organization founded in 1989 on the initiative of the G7 to develop policies to combat money laundering
2. India is a member of FATF since 2010

Which of the above statement(s) given above is/are correct?

- a) 1 only
- b) 2 only

- c) Both 1 and 2
- d) Neither 1 nor 2

Q.72) Akademik Lomonosov recently seen in the news is related to which of the following field ?

- a) Russian missile defence system bought by India
- b) Russian ambassador to Turkey killed in Ankara shooting
- c) Russian floating nuclear power plant
- d) None of the above

Q.73) Which of the following countries are part of Gulf Cooperation Council

1. Bahrain
2. Kuwait
3. Iraq
4. India

Select the correct answer from the codes given below?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1,2 and 4 only
- d) 1,2 and 3 only

Q.74) Swatantra Sainik Samman Pension Scheme is being implemented by which Union Ministry?

- a) The Ministry of Personnel, Public Grievances and Pensions
- b) Ministry of Labour
- c) Ministry of Home Affairs
- d) None of the above

Q.75) UMANG app by Government of India intends to achieve which of the following objectives?

- a) Monitoring of Villages and Households Electrification
- b) To Curb illegal coal mining like rat hole mining, pilferage
- c) To promote mobile governance in India
- d) None of the above

Q.76) Consider the following statements about CITES

1. is as an international legally binding agreement aimed at restricting the trade in endangered Species of Wild Fauna and Flora
2. It replaces the National domestic laws
3. It is also sometimes referred to as Washington Convention as it was agreed in Washington, DC, in 1973.

Which of the statements given above are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3 only

Q.77) India is a member of which of the following International organisations?

1. G7
2. Shanghai Cooperation Organisation
3. Asia-Pacific Economic Cooperation (APEC)
4. Organisation for Economic Cooperation and Development (OECD)

Select the correct answer from codes given below.

- a) 1,2 and 3 only
- b) 2 only
- c) 1,3 and 4 only
- d) 1,2 and 4 only

Q.78) Which of the following best reflects the meaning of Xenotransplantation?

- a) Transferring mitochondrial DNA from donor into recipient embryo
- b) Process of plant reproduction whereby new plant grows from a fragment of the parent plant
- c) Transplanting of organs from one species to another
- d) None of the above

Q.79) Consider the following statements

1. Fedor is Russia's first robot in space which has recently reached International Space Station(ISS)
2. ISS is a joint project between NASA, JAXA, Roscosmos, ISRO and European Space Agency

Which of the statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.80) Consider the following statements about Bonn Challenge

1. It aims to aims to conserve terrestrial, aquatic and avian migratory species throughout their range.
2. India has also joined the voluntary Bonn Challenge pledge.

Which of the statement(s) given above is/are correct?

- a) 1 only
- b) 2 only

- c) Both 1 and 2
- d) Neither 1 nor 2

Q.81) Consider the following statements about Child well-being index

1. It is released by NITI Aayog to track state's progress in enhancing children's well-being in a comprehensive manner
2. Kerala, Tamil Nadu, Himachal Pradesh and Puducherry topped this year's index ranking

Which of the statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.82) Consider the following statements about Eastern Economic Forum

1. EEF is an international forum established by Russia in 1991 to support the economic development of Russia's Far East
2. The Russian Far East comprises the eastern Russian territory between Lake Baikal in eastern Siberia and the Pacific Ocean

Which of the statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.83) Consider the following statements about Eschericia coli (E-Choli)

1. It is a type of virus that which infects humans through mosquito bites
2. It has been linked to intestinal disease as well as aggravating antibiotic resistance.

Which of the statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.84) Consider the following statements about Pradhan Mantri Bhartiya Jan Aushadhi Pariyojana

1. The aim of the scheme is to make healthcare affordable by providing generic medicines through Jan Aushadi Kendras
2. It is being implemented by Union Ministry of Health and Family welfare

Which of the statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.85) Consider the following statements about Compensatory Afforestation Fund(CAF)

1. The Compensatory Afforestation Fund Management and Planning Authority established under Forest Conservation Act 1980 will execute the fund.
2. 90% of CAF funds will flow to States & UT afforestation fund which can be used for catchment area treatment, wildlife management, salaries and travelling allowances for forest officers.

Which of the statement(s) given above is/are incorrect?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.86) Consider the following statements about Coalition for Disaster Resilient Infrastructure (CDRI)

1. The CDRI will create a mechanism to assist countries for upgrading their capacities and practices with regard to infrastructure development in accordance with their risk context and economic needs.
2. Its secretariat will be set up in New Delhi.
3. The charter of the CDRI will be finalized by the National Disaster Management Authority in consultation with Ministry of External Affairs

Which of the statement(s) given above is/are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.87) Consider the following statements

1. Government permitted 100% FDI under automatic route for sale of coal, for coal mining activities including associated processing infrastructure
2. Total FDI flows into India in 2018-19 is the highest ever FDI received for any financial year

Which of the statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.88) Which of the following countries are considered as part of Horn of Africa?

1. Eritrea
2. Ethiopia
3. Somalia
4. Gabon

Select the correct answer from codes given below.

- a) 1,2 and 3 only
- b) 2 and 3 only
- c) 1,3 and 4 only
- d) 1,2,3 and 4

Q.89) Consider the following statements

1. Merging of Public Sector banks will improve operating efficiencies, lead to better usage of equity, enhance geographical synergies and helps tackle rising NPA problem.
2. With the recent mergers of Public sector banks, the number of state-owned banks is reduced from 27 to 12.
3. Narasimham Committee of 1998 had proposed a two-tier banking structure for India - Three large banks of international size and eight to 10 national banks

Which of the statement(s) given above is/are correct?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.90) Consider the following statements

1. The World Population Prospects 2019 which gives global population estimates and projections is released by World Economic Forum
2. India's present Maternal Mortality ratio and adolescent birth rate is higher than the corresponding global ratio/rate.
3. India's fertility rate in 2019 is 2.3 births per woman, compared to 2.5 worldwide

Which of the statement(s) given above is/are **incorrect**?

- a) 1 and 2 only
- b) 2 and 3 only
- c) 1 and 3 only
- d) 1,2 and 3

Q.91) Consider the following statements

1. Fit India movement is aimed at encouraging people to integrate physical activity and sports in their everyday lives.
2. National Sports Day is celebrated on 29th August, the birth anniversary of hockey legend Major Dhyan Chand.

Which of the statement(s) given above is/are correct?

- a) 1 only
- b) 2 only
- c) Both 1 and 2
- d) Neither 1 nor 2

Q.92) Angikaar campaign is being implemented by which Union Ministry?

- a) Ministry of Social Justice & Empowerment
- b) Ministry of Tribal affairs
- c) Union Housing and Urban Affairs Ministry
- d) None of the above

2019 AUGUST MONTH CURRENT AFFAIRS MCQs SOLUTIONS

| | | | |
|------|------|------|------|
| 1 b | 24 c | 47 c | 70 b |
| 2 d | 25 d | 48 b | 71 c |
| 3 b | 26 d | 49 c | 72 c |
| 4 a | 27 b | 50 b | 73 a |
| 5 c | 28 d | 51 c | 74 c |
| 6 a | 29 a | 52 a | 75 c |
| 7 a | 30 b | 53 c | 76 c |
| 8 c | 31 d | 54 a | 77 b |
| 9 a | 32 a | 55 c | 78 c |
| 10 b | 33 d | 56 c | 79 a |
| 11 b | 34 a | 57 c | 80 b |
| 12 b | 35 b | 58 d | 81 b |
| 13 c | 36 b | 59 d | 82 b |
| 14 d | 37 a | 60 a | 83 b |
| 15 c | 38 d | 61 c | 84 a |
| 16 b | 39 a | 62 c | 85 c |
| 17 b | 40 b | 63 c | 86 d |
| 18 a | 41 c | 64 d | 87 c |
| 19 a | 42 a | 65 c | 88 a |
| 20 a | 43 d | 66 a | 89 a |
| 21 d | 44 c | 67 b | 90 a |
| 22 b | 45 a | 68 a | 91 c |
| 23 c | 46 d | 69 a | 92 c |

Sociology Test Series for IAS/CSE Exams

Under Personal Guidance of

Dr. Vamshi Krishna

(Topper in Sociology in 2014 and 2015, BDS and M.A. Sociology)

TEST SERIES HIGHLIGHTS

- Available both in ONLINE MODE and OFFLINE MODE
- 12 meticulously framed question papers (6 sectional + 4 full length tests + 2 bonus full length tests for practice)
- Timely and meticulous evaluation
- Discussion of previous year UPSC question papers and most important areas for mains exam
- Innovative methodology - includes quick revision classes (especially for paper 2) which will build up conceptual clarity and application
- Includes VAN (Value Added Notes)– Our USP which is a rich source for covering Concepts by thinkers, Case studies Current Affairs and Mind maps for quick revision.

For more details, Contact

+91 99661 52157

Batch Starts **SOON**

Contact us IAS BABA branches

Vijayanagara Centre
1737/37, Mrcr Layout
Vijayanagar Service Road,
Vijayanagar, Bengaluru - 5660040

Chandra layout Centre
No.1443/1444, Above Carzspa,
80ft.Main Road, Ganapathi Circle,
Chandra Layout, Bengaluru - 560040



www.iasbaba.com

IAS BABA

One Stop Destination For UPSC/IAS Preparation

FOR ONLINE MODE:

- 12 meticulously framed question papers (6 sectional+ 4 full length tests+2 bonus full length tests for practice) mimicking UPSC pattern which are well spaced out along with well-designed and broad synopsis.
- Mixture of both sectional and full length tests which are harnessed to build confidence and improve content in answer writing.
- Timely and meticulous evaluation. (Within one week of uploading the answer sheet).
- Feedback call after every two tests for personal mentorship to blur the difference between Online and classroom mode especially for students who cannot relocate to Bengaluru.
- Dedicated Telegram group for members which has a repository of materials to be studied and class room notes (for selected topics) for easy and quick reference.
- Personalised doubt solving for queries via dedicated Email.
- VAN (Value Added Notes)– Our USP which is a rich source for covering Concepts by thinkers, Case studies Current Affairs and Mind maps for quick revision.



FOR OFFLINE STUDENTS

- For aspirants willing to relocate to Bengaluru (ONLY) for their Mains preparation we are planning to have quick revision classes (especially for paper 2) which will build up conceptual clarity and application along with evaluation and personal feedback from the mentor Vamshi sir.
- Test schedule will be the same for both online and offline students

ABOUT THE MENTOR

- The classes will be taken by Dr. Vamshi Krishna Sir (a Topper himself in Sociology in UPSC 2014, 2015), BDS, M.A (Sociology)
Working as Assistant Administrative officer at CSIR NAL.
Associated with IASBABA since its inception. He has a teaching experience of 5 Years.
- Dr.Vamshi writes on social issues on blogs. Regular contributor to Research gate and Academia.edu on social issues useful for researchers and social scientists.

“The entire endeavour of our team is to impart sociological orientation along with multiple perspectives and most importantly confidence to tackle the Dynamicity of the paper in the examination hall. Sociology is not only interesting but also highly scoring if studied in a meticulous way...”

– Message from the Mentor!



Political Science Test Series for IAS/CSE Exams

Under Personal Guidance of

Mr. Rahul Saigaonker

A topper himself in Political Science in UPSC 2016, MTech from NITK Surathkal, (MA Pol Sci).
He has keen interest in 21st century Public policy issues and has 5 years of teaching experience.

TEST SERIES HIGHLIGHTS

- 10 meticulously framed question papers (6 sectional+ 4 full length tests) mimicking UPSC pattern which are well spaced out along with well-designed and broad synopsis.
- Mixture of both sectional and full length tests which are harnessed to build confidence and improve content in answer writing.
- Timely and meticulous evaluation. (Within one week of uploading the answer sheet).
- Personalised feedback sessions and group discussions which will enhance your conceptual clarity and application.
- Aspirants will get one on one feedback and evaluation every week from the mentor. 1st Test is on 23rd June 2019 (Sunday)

For more details, Contact

+91 73531 77800

Batch Starts **SOON**

Contact us IAS BABA branches

Vijayanagara Centre
1737/37, Mrcr Layout
Vijayanagar Service Road,
Vijayanagar, Bengaluru - 5660040

Chandra layout Centre
No.1443/1444, Above Carzspa,
80ft.Main Road, Ganapathi Circle,
Chandra Layout, Bengaluru - 560040



www.iasbaba.com

IAS BABA
One Stop Destination For UPSC/IAS Preparation



IAS BABA
One Stop Destination For UPSC/IAS Preparation

POLITICAL SCIENCE AND INTERNATIONAL RELATIONS

OFFLINE CLASSROOM PROGRAMME – 2020

- Classes will be held on Weekdays.
- ORIENTATION Class will be held in the month of July (2nd Week).
- There will be extraordinary attention on answer writing with continuous feedback and improvement.
- There will be weekly One on One discussion with mentor.
- Comprehensive study material will be provided through Class Notes & Printed Notes.
- The focus will be on bringing conceptual clarity and answer writing especially for first time aspirants so that they can compete with experienced candidates on equal footing in Mains 2020.

Contact us IAS BABA branches

Vijayanagara Centre
1737/37, Mrcr Layout
Vijayanagar Service Road,
Vijayanagar, Bengaluru - 5660040

Chandra layout Centre
No.1443/1444, Above Carzspa,
80ft.Main Road, Ganapathi Circle,
Chandra Layout, Bengaluru - 560040



www.iasbaba.com

Geography Test Series for IAS/CSE Exams

TEST SERIES HIGHLIGHTS

- 12 meticulously framed question papers (6 sectional+ 4 full length tests+2 bonus full length tests for practice) mimicking UPSC pattern with meticulously designed question papers.
- Mixture of both sectional and full length tests which are harnessed to build confidence and improve content in answer writing.
- Timely and UPSC Standard evaluation. (Within one week of uploading the answer sheet).
- The tests shall be followed by detailed discussions and one on one sessions for feedback and comments. 1st Test is on 23rd June 2019 (Sunday)

For more details, Contact

 **+91 73531 77800**

Batch Starts SOON

Contact us **IAS BABA branches**

Vijayanagara Centre
1737/37, Mrcr Layout
Vijayanagar Service Road,
Vijayanagar, Bengaluru - 5660040

Chandra layout Centre
No.1443/1444, Above Carzspa,
80ft.Main Road, Ganapathi Circle,
Chandra Layout, Bengaluru - 560040



www.iasbaba.com

IAS BABA
One Stop Destination For UPSC/IAS Preparation



OFFLINE CLASSESROOM PROGRAMME – 2020

Geography

- It will be a classroom based program spanning 3 to 4 months.
- In a week, total number of classroom sessions conducted will be 6 (sessions/week).
- Classes will be conducted on 4 days (2 days on the weekdays & 2 days on the weekends)
- Perspective driven classroom sessions.
- Each session will comprise of intensive conceptual learning, discussion on previous year questions, quizzes, discussions etc.
- Master the technique of using the 6 tools of Geography to score really high in Mains.
- Value add notes (VAN) and Synopsis on selected topics.

For more details, Contact

 **+91 73531 77800**

Batch Starts SOON

Contact us **IAS BABA branches**

Vijayanagara Centre
1737/37, Mrcr Layout
Vijayanagar Service Road,
Vijayanagar, Bengaluru - 5660040

Chandra layout Centre
No.1443/1444, Above Carzspa,
80ft.Main Road, Ganapathi Circle,
Chandra Layout, Bengaluru - 560040



www.iasbaba.com