

CONTENTS

S. No.	Topic	Page No.
<u>I. POLITY & GOVERNANCE</u>		
1.	All India Citizens Survey of Police Services	1
2.	National Common Mobility Card (NCMC)	1
3.	International Mother Language Day	2
<u>II. SOCIAL JUSTICE</u>		
4.	Women Safety Initiatives	4
5.	4 th Global Digital Health Partnership Summit	5
6.	Permanent Residence Certificate (PRC)	6
7.	Substance Use in India	7
<u>III. ECONOMY</u>		
8.	Banks may set repo rate as benchmark for lending	8
9.	Prompt Corrective Action framework	9
10.	Draft e-Commerce Policy	10
11.	IPrism	10
<u>IV. ENVIRONMENT</u>		
12.	Monkey Declared Vermin in Himachal Pradesh	11
13.	Bramble Cay melomys is first mammal to go extinct due to climate change	12
14.	Cheetah Reintroduction Project	12
15.	Sustainable Alternative Towards Affordable Transportation (SATAT) Scheme	13
16.	Major fire at Bandipur Tiger Reserve	14
<u>V. INTERNATIONAL RELATIONS</u>		
17.	Organisation of Islamic cooperation	14
18.	Prisoner of War	15
<u>VI. SCIENCE & TECHNOLOGY</u>		
19.	Atmospheric Water Generator (AWG)	16
20.	Govt. to launch a public DNS server	16
21.	National Science Day 2019	17
<u>VII. PRELIMS/MISCELLANEOUS</u>		
22.	“Waste to Wonder” Park	17
23.	India’s first indigenous semiconductor chips for 4G/LTE and 5G NR modems	17
24.	Tata Steel recognised as one of World’s Most Ethical Companies	17
25.	Afghanistan launches new export route to India through Iran	17

26. World Class Initiative in India	18
27. National War Memorial	18
28. Ayushman Bharat	18
29. Angkor	19
30. Assam to penalize people ignoring parents	19
Questions	20



I. POLITY & GOVERNANCE

TOPIC: GS II, NEED FOR POLICE REFORMS, GOVERNANCE

1. All India Citizens Survey of Police Services

Source: PIB

Why in news:

- Ministry of Home Affairs has commissioned the Bureau of Police Research and Development to conduct a pan-India survey called "ALL INDIA CITIZENS SURVEY OF POLICE SERVICES" to gauge public perception of police.
- The survey will be conducted by the Bureau of Police Research and Development with the help of the National Council of Applied Economic Research in a period of nine months.
- The Ministry approved to conduct the survey with an aim to strengthen the model of good governance by acting as a link between the people and the government, considering that a globally accepted way to assess the impact of government initiatives is through public perception surveys.

Aim:

- The survey is aimed to understand public perceptions about Police,
- Gauge the level of non-reporting of crimes or incidents to Police.
- The position on ground relating to crime reporting and recording, timeliness and quality of police response and action, and
- To assess citizens' perception and experience about women and children's safety.

All India Citizens Survey of Police Services:

- The survey will commence in mid March 2019 and will cover a representative sample of 1.2 lakh households spread over 173 districts across the country, based on the National Sample Survey framework.
- All States and Union Territories would be suitably represented in this survey.
- States/UTs have been requested to extend full cooperation to the conduct of the survey, and prepare their Police for undertaking such surveys on their own.
- The survey aims to understand public perceptions and their attitudes about Police.
- It aims to know the level of number of crimes or incidents in which matter is not reported to Police, and also about crime reporting and recording.

- It will assess citizens' perception and experience about women and children safety.

Significance:

- The outcome of the survey is expected to bring out useful suggestions for stakeholders in formulating and implementing appropriate policy responses.
- It will imbibe changes in the functioning of police at the cutting edge and for improve crime prevention and investigation.
- It will cater to transformation in community policing, improvement in the access to the justice and increased/ appropriate resource allocation for police in a systematic manner.

TOPIC: GS II, GOVERNMENT POLICIES AND INTERVENTIONS FOR DEVELOPMENT IN VARIOUS SECTORS AND ISSUES ARISING OUT OF THEIR DESIGN AND IMPLEMENTATION

2. National Common Mobility Card (NCMC)

Source: The Hindu

Why in news:

The Prime Minister has recently launched 'One Nation, One Card' for seamless travel through different metros and other transport systems.

Background:

- Public Transport is extensively used across India as the economical and convenient mode of commuting for all classes of society. Cash continues to be the most preferred mode of fare payments across public transport. However, there are multiple challenges associated with the cash payment e.g. cash handling, revenue leakages, cash reconciliation etc.
- Various initiatives have been taken by transit operators to automate & digitize the fare collection using Automatic Fare Collection System (AFC).
- The introduction of closed-loop cards issued by these operators helped to digitize the fare collection to a significant extent.
- However, the restricted usability of these payment instruments limits the digital adoption by customers.
- AFC System (gates, readers/validators, backend infrastructure etc.) is the core of any transit operator to automate the fare collection process.
- The major challenge associated with AFC system implementation in India till now is the lack of indigenous solution provider.

- Till now, AFC systems deployed at various Metros are from foreign players.
- In order to avoid the vendor lock-in and create an interoperable system, there was a need to develop indigenous standards and AFC system under the Make in India initiative.
- In order to ensure seamless travel across metros and other transport systems in addition to retail shopping and purchases, the Ministry of Housing & Urban Affairs (MoHUA) came out with the National Common Mobility Card (NCMC) Program.
- The Union Ministry of Housing and Urban Affairs introduced the 'National Common Mobility Card' (NCMC) to enable seamless travel by different metros and other transport systems across the country besides retail shopping and purchases.

What is the One Nation, One Card?

- The Indigenous Automatic Fare Collection System based on One Nation One Card Model i.e. National Common Mobility Card (NCMC) is the first of its kind in India.
- India's First Indigenously Developed Payment Ecosystem for transport consisting of NCMC Card, SWEEKAR (Swachalit Kiraya: Automatic Fare Collection System) and SWAGAT (Swachalit Gate) is based on NCMC Standards.
- These are bank-issued cards on Debit/Credit/Prepaid card product platform.

How customers can use One Nation, One Card?

- The customers can use this single card for payments across all segments including metro, bus, suburban railways, toll, parking, smart city and retail.
- The stored value on the card supports offline transaction across all travel needs with minimal financial risk to involved stakeholders.
- The card supports various service area features such as monthly passes, season tickets, etc.

Significance:

- NCMC Ecosystem offers the value proposition for customers as they need not carry multiple cards for different usage.
- Further, the super quick contactless transactions will improve the seamless experience. For operators, the NCMC ecosystem brings common standards for implementation without vendor lock-in.
- This will also help in higher digital payments penetration, savings on closed loop card lifecycle management cost and reduced operating cost.

- The rich data insights may be used by operators for business intelligence leading to efficient operation.
- With the NCMC Ecosystem, Banks will get access to segments which are highly driven by cash but stickiness in nature.
- NCMC Ecosystem will further help the government in digitization of low-value payments and reduced cost for the entire ecosystem.

The first level trails:

- In order to showcase the entire NCMC ecosystem for digital fare collection, the complete AFC system has been deployed in Delhi Metro Rail Corporation (DMRC) across few stations for field trial purpose.
- Under this pilot, NCMC compliant gates have been deployed at various stations of DMRC and cards have been issued by multiple banks to the users.
- The pilot at DMRC was inaugurated by MoHUA on Jan 31st, 2019.
- This pilot will help to improve hardware reliability and fine-tuning of the software.
- This will also facilitate large scale indigenous production and deployment in the Indian transit system.
- The first level trails have been successfully completed in collaboration with CDAC, BEL, NPCI and SBI.

Agencies behind National Common Mobility Card:

- The C-DAC finalised NCMC specification for AFC system including the interface with Bank server. CDAC worked in collaboration with NPCI to complete this activity.
- The Bharat Electronics Limited (BEL) was roped in for making Gates and Reader.
- This is the first gate and the reader which has been manufactured by an Indian company.

TOPIC: GS II, CULTURE

3. International Mother Language Day

Why in news:

International Mother Language Day has been recently celebrated as International Year of Indigenous languages on 21st February.

Background:

- In 1998, Bangladesh expatriate Rafiqul Islam had written to UN secretary general Kofi Annan to take steps to save world languages from extinction by declaring International Mother Language Day.

- February 21 was proposed as International Mother Language Day since it was the 1952 killings in Dhaka during the language movement. It was one of the very rare incidents in the history where people sacrifice their lives for their mother tongue.
- In 1999 UNESCO proclaimed February 21 as the International Mother Language Day.
- For over 20 years, UNESCO has been celebrating International Mother Language Day on Feb 21st to promote mother tongue-based multilingual education.
- The world has over 7,000 languages.
- India alone has about 22 officially recognised languages, 1635 mother tongues and 234 identifiable mother tongues.
- International Mother Language Day is a reminder of how language connects, empowers and helps us to communicate our feelings to others.

Mother Language Day:

- The very first language which one hears understands and gets familiar is the Mother's tongue.
- Languages are vital to the progress of a society and communication among people.
- Mother Language Day has been celebrated across the world since the year 2000.
- The day aims to create awareness about preserving and promoting mother tongue languages.
- UNESCO declared 21 February as International Mother Language Day in 1999.
- The initiative was aimed at preserving and promoting mother tongue languages and to protect the diverse culture and intellectual heritage of different regions of the world.

Mother Language Day, 2019:

- It marked as the International Year of Indigenous languages.
- It aims to raise awareness of the dangers of losing the indigenous language.
- UN aims to support the revitalisation and maintenance of Indigenous languages.
- The day also honours Bangladesh fight for the recognition of Bangla language.
- 21 February is the anniversary of the movement to protect their cultural roots through their mother languages.

Threats to Mother Language:

- When languages fade, so does the world's rich tapestry of cultural diversity.

- Opportunities, traditions, memory, mode of thinking and expression are lost.
- At least 43% of the estimated 6000 languages spoken in the world are endangered.
- Only a few hundred languages have a place in education systems and public domain.
- Less than a hundred languages used in the digital world.
- Rush to learn foreign languages for better job opportunities have played a deceptive role.
- UN says every two weeks a language disappears.

Impact on culture:

- There is a significant rise in use of diluted and diversified vocabulary in all forms of communications.
- This had a long-term impact on local languages which is evident in our inability to speak one language perfectly.
- The lack of ability to understand one language in contemporary society is also reflected in multilingual movies and songs.
- The dominance of such content can be attributed to it's connect with the audience.

Importance of Mother Language:

- It is Important in shaping feelings, emotions and thought process.
- It maintains languages of an ethnic and cultural group is critical to preserve cultural heritage and identify.
- Using one's mother tongue at home makes it easier for children to be comfortable with cultural identity.
- It develops fuller awareness of linguistic and cultural traditions throughout the world and to inspire solidarity based on understanding, tolerance and dialogue.

Preserving Mother Language:

- Technology trying to reach out in every language.
- Phones, computer software, NCERT, Open School Education have options to work in native languages.
- Professionally also it is a viable option for several people who have pursued an education in the native language.
- Professions like tourist guide translators, language expert docents.
- France, Germany, Italy, China have developed with mother languages as a powerful medium.

Conclusion:

- Today there is growing awareness that languages play a vital role in development, in ensuring cultural diversity and intercultural dialogue.
- This initiative will not only increase awareness of language issues but also mobilise partners and resources for supporting the implementation of strategies and policies in favour of language diversity and multilingualism across the world.

II. SOCIAL JUSTICE

TOPIC: GS II, WOMEN SAFETY, SOCIAL ISSUES

4. Women Safety Initiatives

Source: The Hindu

Why in news:

The Central Government has recently launched three significant initiatives to promote the safety of women in their living spaces, working spaces and the public spaces.

Background:

- The Union Government has enacted the Criminal Law (Amendment) Act, 2018 to provide effective deterrence against the offence of rape.
- For the effective implementation of the Act, to strengthen investigation and prosecution machinery and to instill a sense of security amongst women, the government launched these initiatives.

About the Initiatives:

- The Union Home Minister and Minister for Women and Child Development jointly launched three significant initiatives to promote the safety of women in their living spaces, working spaces and the public spaces in 16 States/UTs and Mumbai city.
- The initiatives include Emergency Response Support System, Investigation Tracking System for Sexual Offences (ITSSO) and Safe City Implementation Monitoring Portal.
- The Ministry launched an Emergency Response Support System in 16 states and union territories.

Objective:

- To strengthen investigation and prosecution machinery, and to instill a sense of security amongst women.

Emergency Response Support System (ERSS):

- The Emergency Response Support System (ERSS) is a pan-India single number (112) based response system for persons in distress.
- Under this system, all the states have to set up a dedicated Emergency Response Centre (ERC).

- The centres will have a team of trained call-takers and dispatchers to handle emergency requests relating to assistance from police, fire & rescue, health and other emergency services.
- The police can view all events after an emergency call is made at the ERC.
- The ERCs are connected to District Command Centres (DCC) and the Emergency Response Vehicles and assistance and response to victims are facilitated through them.
- The centre is designed to be a common protocol managed by each state and union territory.
- For Women and children, 112 India App provides a special SHOUT feature which alerts registered volunteers in the vicinity of the victim for immediate assistance.
- The service has already been launched in Himachal Pradesh and Nagaland.

Investigation Tracking System for Sexual Offences (ITSSO):

- The Investigation Tracking System for Sexual Offences (ITSSO) is an online module available to law enforcement agencies at all levels- national, state, district and police station that allows states to undertake real-time monitoring and management for completion of investigation in rape cases in two months.
- The system leverages the existing CCTNS database, which covers nearly 15000 police stations in the country.
- It would greatly strengthen the states' ability for analytics and prognosis for timely investigation and prosecution in rape cases.
- The Criminal Law Amendment in April 2018 prescribes stringent penal provisions including the death penalty for rape of a girl below the age of 12 years.
- For swift administration of justice in such cases, the Act also inter-alia mandates completion of investigation and trials within two months.
- To enhance women safety in the country, the government has formulated a multi-pronged action plan and initiated a series of measures. ITSSO is one of such measures developed by the Home Ministry towards smart policing.

Safe City Implementation Monitoring (SCIM) portal:

- The Government has identified eight cities for implementation of Safe City projects in the first phase at a cost of Rs 2,919 crore, in order to instill a sense of security in women in metro cities.

- The cities include Ahmedabad, Bengaluru, Chennai, Delhi, Hyderabad, Kolkata, Lucknow and Mumbai.
- The projects are funded under the Nirbhaya Fund scheme.
- They have been prepared jointly by Municipal bodies and City Police and reflect integrated action for the safety of women.
- The safe city projects involve the creation of on-ground assets, resources and behaviour change programs for the safety of women.
- The projects will supplement existing assets and meet citizen demands for safe eco-system for women in these cities.

Key features of projects:

- Identification of crime hot-spots in each city.
- Saturating such Hot-spots with increased CCTV surveillance.
- Automated Number Plate Reading (ANPR) and drone-based surveillance also being deployed in few cities as per requirement.
- Setting up women police out-posts for facilitating ease of access by any aggrieved woman to report incidence or seek assistance.
- Patrols by women police in vulnerable areas.
- Setting up women help desks in police stations with facility for trained counsellors
- Augmentation of existing women support centres like Asha Jyoti Kendra or Bharosa centres
- Implementing safety measures in buses, including cameras.
- Improving street lighting in identified hot spot areas.
- Setting up toilets for women.
- Undertaking social awareness programmes on women safety and gender sensitivity.
- All the measures would be coordinated through an Integrated Smart Control Room in the city.
- The portal will facilitate online tracking of deployment of assets and infrastructure created under the Safe City projects.
- It will facilitate an evidence-based online monitoring system.
- The details on assets and infrastructure are captured along with latitude and longitude using GPS for greater transparency.
- The portal also creates a digital repository of assets, infrastructure and social outreach programs, as well as best practices achieved in each city.

5. 4th Global Digital Health Partnership Summit

Source: The Hindu

Why in news:

Union Minister of Health and Family Welfare has recently inaugurated the '4th Global Digital Health Partnership Summit.

What is Global Digital Health Partnership (GDHP)?

- The Global Digital Health Partnership (GDHP) is an international collaboration of governments, government agencies and multinational organisations dedicated to improving the health and well-being of their citizens through the best use of evidence-based digital technologies.
- Governments are making significant investments to harness the power of technology and foster innovation and public-private partnerships that support high quality, sustainable health and care for all.
- The GDHP facilitates global collaboration and co-operation in the implementation of digital health services.
- The global intergovernmental meeting on digital health is being hosted by the Ministry of Health and Family Welfare in collaboration with the World Health Organization (WHO) and the Global Digital Health Partnership (GDHP).
- The Ministerial Conclave discussed the implication of digital health interventions to health services accessibility, quality and affordability and explores ways of leveraging digital health technologies to strengthen the healthcare delivery systems globally.

Key Highlights:

- Union Minister of Law & Justice and Electronics & Information Technology highlighted the various initiatives of the Government towards digital healthcare.
- He said that India is committed to reaching the last man in the line through digital health interventions and digital inclusion.
- He also said digital governance is good governance and bridging a digital divide must be achieved through technology that is low cost.
- Union Minister of Health and Family Welfare said that the entire healthcare system in India and the world is undergoing a rapid transformation.
- The way we know of healthcare being delivered and accessed is poised to change for better.

- The digital health interventions are accelerating this transformation.
- It has a huge potential for supporting Universal Health Coverage (UHC) for which Government of India is committed.
- India is committed to securing Universal Health Coverage for the underprivileged and deprived section of our society with the launch of a comprehensive healthcare scheme by the name of Ayushman Bharat, with the twin pillars of Health & Wellness Centres (HWCs) at primary and secondary levels of healthcare and PM-Jan Aarogya Yojana (PM JAY) at the tertiary level.
- In merely 155 days, nearly 1.3 million people have availed the benefits of more than Rs.16 Billion under this scheme.
- He also mentioned that Ayushman Bharat is primarily dependent on maximising the use of digital tools for effective implementation and monitoring.
- The scheme is completely digital wherein all the processes from beneficiary identification to hospital empanelment and settlement of claims are done electronically.
- Hence all the benefits of the scheme are delivered in a mode that is cashless, paperless & completely transparent for all stakeholders.

India's Efforts towards Digital Health:

- Union Minister of Health and Family Welfare said that through robust digital interventions the government has ensured that continuum of care across primary, secondary and tertiary facilities get delivered.
- We have embraced digital health to achieve the targets of UHC.
- He further said that a "National Resource Centre for EHR Standards" has also been set up in order to augment facilitation for the adoption of the notified EHR Standards.
- The Indian government has notified health informatics standards and approved Metadata & Data Standards for enabling the seamless exchange of information across care providers to make these systems interoperable and to build electronic health records of citizens.
- He added that India took the world stage at the 71st World Health Assembly in Geneva, Switzerland by successfully introducing and unanimous adoption of Resolution on Digital Health.
- This resolution highlighted global attention to the potential, challenges and opportunities of Digital

Health interventions and the need for closer collaboration on the issue globally for countries achieving health-related SDG targets as well WHO's the implementation of 13th General Program of Work.

- He said that the Health Ministry is in the process of establishing an Integrated Health Information Platform for interoperability amongst various health-IT systems and a pan-India exchange of Electronic Health Records of citizens ensuring privacy, security, and confidentiality of data.
- The same is to be supplemented by a pan-Indian network of disease surveillance, telemedicine and tele-radiology and tele-education.

TOPIC: GS II, SOCIAL ISSUES

6. Permanent Residence Certificate (PRC)

Why in news:

- The violence in Arunachal Pradesh capital Itanagar primarily started recently as a protest against the probability of granting Permanent Residence Certificate (PRC) to members of six communities, (Adivasi, Deori, Gorkha, Mishing, Moran, and Sonowal Kachari) mainly inhabiting Namsai and Changlang districts of the state.
- Over the last three days, one protester has died of a bullet wound after firing by security forces, houses of ministers have been attacked, public vehicles burnt, media personnel on duty threatened, and offices of powerful student organisations like All Arunachal Pradesh Students' Union (AAPSU) set on fire.
- The Indian Army conducted a flag march in Itanagar and a defence statement said soldiers were "deployed to impose caution on protesters".

'Long pending demand' for PRC:

- In Arunachal Pradesh, it has been a long-pending demand of these communities to get PRC and be recognised as residents of the state but the demand has run into trouble with powerful groups which oppose the same.
- Persons belonging to some of the communities in the quest now were issued PRCs earlier till 1992-93, which was stopped consequently.
- Last year, the state government had announced granting PRC to the communities by January and then too powerful groups like AAPSU among others.

About Joint High Power Committee (JHPC):

- The government then had said it will examine the issue of PRCs only after receiving a report from the Joint High Power Committee (JHPC).

- The JHPC included members of political parties, student organisations and other groups held multiple rounds of meetings with all stakeholders and was expected to table its recommendations in the Assembly this week.
- The PRC is a document of a person's residence in a state, and is useful in availing reservations against quotas for state residents in educational institutes and quota-based jobs.
- Each state tends to have its own eligibility criteria.
- In Arunachal Pradesh, PRCs have mostly been issued to the state's Scheduled Tribes (APSTs).

Old demand, issue flares up just before polls:

- It has been a long-pending demand of six communities in Arunachal to get PRC so as to be recognised as residents of the state, but it is opposed by powerful groups in the state.
- Given that the government had said it was putting off any call on it for now, the protests are puzzling, leading to claims of political backing, with Assembly polls slated to be held along with general elections in a couple of months.

Politics over PRC and the protests in Arunachal Pradesh:

- Although nothing is known officially about the recommendations prepared by the JHPC, sources said that it suggested the granting of the PRC to these communities with a cut-off year of 1968.
- Owing to large public sentiment against it, the government did not table the recommendations of the JHPC in the Assembly.
- And yet the violence in Itanagar went on perplexing many and raising questions of political backing to the protests.
- The state government decided not to take the PRC matter in current Assembly Session."
- Considering the present situation in respect of the matter pertaining to grant of PRC to non-APST residents of Namsai and Changlang districts, the state government decided not to take further action in respect of grant of PRC".

TOPIC: GS II, HEALTH

7. Substance Use in India

Source: The Hindu

Why in news:

National Drug Dependence Treatment Centre (NDDTC) of the All India Institute of Medical Sciences (AIIMS), New Delhi has recently submitted its report "Magnitude of Substance Use in India" sponsored by the Ministry of Social Justice and Empowerment to Union Minister for Social Justice and Empowerment.

About the Report:

- The Ministry of Social Justice and Empowerment has conducted a "National Survey on Extent and Pattern of Substance Use in India" through the National Drug Dependence Treatment Centre (NDDTC) of AIIMS, New Delhi during 2018 which provides data at the National level as well as at the State level.
- The State governments and all other stakeholders including NGOs and Drug De-addiction centres will be consulted to formulate guidelines and action plan to counter the menace of drug abuse.
- This Survey conducted at the National level as well as at the State level is first of its kind.

A combination of two data collection approaches was employed in the Survey:

- A Household Survey (HHS) was conducted among the representative, general population (10-75 years old) of all the 36 states and UTs of the country.
- This was aimed primarily at studying the use of common, legal substances like; Alcohol and Cannabis.
- At the national level, a total of 200,111 households were visited in 186 districts and a total of 473,569 individuals were interviewed.
- A Respondent Driven Sampling (RDS) survey along with multiplier approach was conducted in 123 districts among 70,293 people suffering from dependence on illicit drugs.
- This was aimed primarily for estimating the prevalence of dependence on the illicit drug (since the HHS tends to underestimate illicit drug use).

Substance categories studied:

- Alcohol, Cannabis (Bhang and Ganja/Charas), Opioids (Opium, Heroin and Pharmaceutical Opioids), Cocaine, Amphetamine Type Stimulants (ATS), Sedatives, Inhalants and Hallucinogens.

Major findings of the Survey:

Alcohol:

- At the national level, about 14.6% of people among 10-75 year old are current users of alcohol, i.e. about 16 Crore people.
- Its prevalence is 17 times higher among men than women.
- In other words, every third alcohol user in India needs help for alcohol-related problems.
- States with the high prevalence of alcohol use are Chhattisgarh, Tripura, Punjab, Arunachal Pradesh and Goa.

Cannabis:

- About 2.8% of Indians (3.1 Crore individuals) reported having used any cannabis product within past 12 months (Bhang – 2% or 2.2 crore people; Ganja/Charas – 1.2% or 1.3 Crore people).
- About 0.66% of Indian, approximately 72 lakh individuals, need help for their cannabis use problems.
- Though bhang use is more common than ganja/charas, the prevalence of harmful/dependent use is proportionately higher for ganja/charas users.
- States with the higher than national prevalence of cannabis use are Uttar Pradesh, Punjab, Sikkim, Chhattisgarh and Delhi.
- In some states, the prevalence of cannabis use disorders is considerably higher (more than thrice) than the national average (i.e. Sikkim, Punjab).

Opioids:

- At the national level, the most common opioid used is Heroin, (current use 1.14%) followed by Pharmaceutical opioids (current use 0.96%) and then Opium (current use 0.52%).
- Prevalence of current use of opioids overall is 2.06% and about 0.55% of Indians are estimated to need help for their opioid use problems.
- More people are dependent upon Heroin than Opium and Pharmaceutical Opioids.
- Of the total estimated approximately 60 lakh people with opioid use disorders (harmful or dependent pattern) in the country, more than half are contributed by just a few states: Uttar Pradesh, Haryana, Punjab, Delhi, Maharashtra, Rajasthan, Andhra Pradesh and Gujarat.

Sedatives and Inhalants:

- About 1.08% of 10-75-year-old Indians (approximately 1.18 crore people) are current users of sedatives (non-medical, non-prescription use).
- States with the highest prevalence of current Sedative use are Sikkim, Nagaland, Manipur and Mizoram. However, Uttar Pradesh, Maharashtra, Punjab, Andhra Pradesh and Gujarat are the top five states which house the largest populations of people using sedatives.
- Inhalants are the only category of substances for which the prevalence of current use among children and adolescents is higher (1.17%) than adults (0.58%).
- At the national level, an estimated 4.6 lakh children and 18 lakh adults need help for their inhalant use (harmful use or dependence).

- In terms of absolute numbers, states with a high population of children needing help for inhalant use are Uttar Pradesh, Madhya Pradesh, Maharashtra, Delhi and Haryana.
- Cocaine (0.10%) Amphetamine Type Stimulants (0.18%) and Hallucinogens (0.12%) are the categories with the lowest prevalence of current use in India.
- Nationally, it is estimated that there are about 8.5 Lakh People Who Inject Drugs (PWID).
- High numbers of PWID are estimated in Uttar Pradesh, Punjab, Delhi, Andhra Pradesh, Telangana, Haryana, Karnataka, Maharashtra, Manipur and Nagaland.
- Opioid group of drugs are predominantly injected by PWID (heroin – 46% and pharmaceutical opioids – 46%).
- A substantial proportion of PWID reports risky injecting practices.

Access to Treatment Services:

- In general, access to treatment services for people affected by substance use disorders is grossly inadequate.
- Just about one in 38 people with alcohol dependence report getting any treatment.
- Only about one in 180 people with alcohol dependence report getting inpatient treatment or hospitalization for help with alcohol problems.
- Among people suffering from dependence on illicit drugs, one among 20 people has ever received inpatient treatment or hospitalization for help with drug problems.

III. ECONOMY

TOPIC: GS III, INDIAN ECONOMY AND ISSUES RELATING TO PLANNING, MOBILIZATION OF RESOURCES, GROWTH, DEVELOPMENT

8. Banks may set repo rate as benchmark for lending

Source: The Hindu

Why in news:

Most commercial banks in India are likely to select RBI's repo rate as the external benchmark to decide their lending rates, from April 1.

Key points:

- The repo rate is the key policy rate of the Reserve Bank of India (RBI).

- Banks had four options from which to choose the external benchmark: the repo rate, the 91-day treasury bill, the 182-day T-bill or any other benchmark interest rate produced by the Financial Benchmarks India Private Ltd (FBIL).
- The marginal cost of fund based lending rate (MCLR) is currently the benchmark for all loan rates. Banks typically add a spread to the MCLR while pricing loans for homes and automobiles.

Background:

- The RBI has mandated that the spread over the benchmark rate to be decided by banks at the inception of the loan should remain unchanged through the life of the loan. It should remain unchanged unless the borrower's credit assessment undergoes a substantial change and as agreed upon in the loan contract.
- If the lending rates are linked to the repo rate, any change in the repo rate will immediately impact the home and auto loan rates, since RBI has mandated the spread to remain fixed over the life of the loan.

Benefits of setting Repo Rate as benchmark for lending:

- It will make the system more transparent since every borrower will know the fixed interest rate and the spread value decided by the bank.
- It will help borrowers compare loans in a better way from different banks.
- There shall be standardisation and ease of understanding for the borrowers. This would mean that same bank cannot adopt multiple benchmarks within a loan category.

Repo Rate:

- Repo (Repurchasing Option) refers to the rate at which commercial banks borrow money from the RBI in case of shortage of funds.
- It is one of the main tools of RBI to keep inflation under control.

MCLR:

- The Marginal Cost of Funds based Lending Rate (MCLR) system was introduced by the Reserve Bank to provide loans on minimal rates as well as market rate fluctuation benefit to customers. This system has modified the existing base rate system of providing home loans. In this system, banks have to set various benchmark rates for specific time periods starting from an overnight to one month, quarterly, semi-annually and annually.
- MCLR replaced the earlier base rate system to determine the lending rates for commercial banks. RBI implemented it on 1 April 2016 to determine rates of interests for loans.

MCLR aims:

- To improve the transmission of policy rates into the lending rates of banks.
- To bring transparency in the methodology followed by banks for determining interest rates on advances.
- To ensure availability of bank credit at interest rates which are fair to borrowers as well as banks.
- To enable banks to become more competitive and enhance their long run value and contribution to economic growth.

TOPIC: GS III, INDIAN ECONOMY AND ISSUES RELATED TO PLANNING

9. Prompt Corrective Action framework

Source: The Hindu

Why in news:

Three more banks — Allahabad Bank and Corporation Bank, from the public sector, and Dhanlaxmi Bank from the private sector — are now out of the Reserve Bank of India's (RBI) prompt and corrective action (PCA) framework.

- Currently, there are another six banks that are still under PCA framework.

About PCA:

Prompt Corrective Action (PCA) framework has been issued by the RBI to maintain the sound financial health of banks.

- The Reserve Bank has specified certain regulatory trigger points, as a part of prompt corrective action (PCA) Framework, in terms of three parameters, i.e. capital to risk weighted assets ratio (CRAR), net non-performing assets (NPA) and Return on Assets (RoA), for initiation of certain structured and discretionary actions in respect of banks hitting such trigger points.
- The PCA framework is applicable only to commercial banks and not extended to co-operative banks, non-banking financial companies (NBFCs) and FMs.

What are the types of restrictions?

- There are two types of restrictions, mandatory and discretionary. Restrictions on dividend, branch expansion, directors compensation, are mandatory while discretionary restrictions could include curbs on lending and deposit.

What will a bank do if PCA is triggered?

- Banks are not allowed to renew or access costly deposits or take steps to increase their fee-based income. Banks will also have to launch a special drive to reduce the stock of NPAs and contain

generation of fresh NPAs. They will also not be allowed to enter into new lines of business. RBI will also impose restrictions on the bank on borrowings from interbank market.

Impact:

- Small and medium enterprises will have to bear the brunt due to this move by RBI. Since the PCA framework restricts the amount of loans banks can extend, this will definitely put pressure on credit being made available to companies especially the MSMEs.
- Large companies have access to the corporate bond market so they may not be impacted immediately. It has been predicted that if more state-owned banks are brought under PCA, it will impact the credit availability for the MSME segment.

TOPIC: GS III, GOVERNMENT POLICIES AND INTERVENTIONS FOR DEVELOPMENT IN VARIOUS SECTORS AND ISSUES ARISING OUT OF THEIR DESIGN AND IMPLEMENTATION

10. Draft e-Commerce Policy

Source: PRS

Why in news:

The Department of Industry and Internal Trade (DPIIT) has released the draft National e-commerce Policy.

- It sends a clear message that India and its citizens have a sovereign right to their data.

The policy addresses six areas:

- (i). cross-border data,
- (ii). infrastructure development,
- (iii). e-commerce marketplaces,
- (iv). stimulating domestic demand,
- (v). regulatory issues, and
- (vi). export promotion.

Key features of the ecommerce policy include:

- **Data:** Creating a legal and technological framework for imposing restrictions on cross-border data flow from specified sources, including data generated by users in India on e-commerce platforms, social media, and search engines.
- Further, the policy lays down certain conditions for businesses regarding collection or processing of sensitive data locally and storing it abroad. These are: (i) all data stored abroad shall not be made available to business entities outside India, even with the customer's consent; (ii) such data should also not be made available to a third party, and (iii) such data should not be shared with a

foreign government, without the prior permission of Indian authorities.

- **Foreign direct investment:** The policy aims at demarcating what constitutes a marketplace model and what comprises an inventory-based model of sale and distribution. It aims at inviting and encouraging foreign investment in the 'marketplace' model alone. This implies that an e-commerce platform, in which foreign investment has been made, cannot exercise ownership or control over the inventory sold on its platform.
- **Custom duties:** On taxation-related issues in the sector, the draft policy said the current practice of not imposing custom duties on electronic transmissions must be reviewed.
- **Export promotion:** The policy states that there is a need to incentivise exports and reduce administrative requirements and costs for outbound shipments. Further, it states that the existing limit of Rs 25,000, above which products are exported through cargo mode should be increased. This would make Indian e-commerce exports attractive even for high-value shipments through courier mode.
- **Regulation for E-comms:** No separate regulator for ecommerce sector.
- E-consumer courts to be developed.

TOPIC: GS III, ISSUES RELATED TO IPR

11. IPrism

Source: PIB

Why in news:

The Cell for IPR Promotion and Management (CIPAM), Department for Promotion of Industry and Internal Trade, in collaboration with ASSOCHAM and ERICSSON India, has launched the second edition of 'IPrism', an Intellectual Property (IP) competition for students of schools, polytechnic institutes, colleges and universities.

- Aiming to foster a culture of innovation and creativity in the younger generation, the competition will provide young creators an opportunity to see their creations recognized on a national platform.

Significance:

- Creating IP awareness has become significant in today's knowledge economy where innovations determine the development and success of a nation. Generating awareness will not only inspire students about innovation and its limitless possibilities, but will also aid in building respect for IP rights and deterring counterfeiting and piracy.

About CIPAM:

- The National IPR Policy was adopted on May 12, 2016, to create a vibrant IP ecosystem in the country. Creating IPR Awareness through outreach and promotional activities is a key objective of the Policy. The Cell for IPR Promotion and Management, set up under the aegis of the DPIIT to fulfil the policy objectives, has been actively involved in many outreach activities including a nation-wide IPR awareness campaign.

IV. ENVIRONMENT

TOPIC: GS III, CONSERVATION, ENVIRONMENTAL POLLUTION AND DEGRADATION

12. Monkey Declared Vermin in Himachal Pradesh

Sources: Indian Express, The Hindu

What's the news?

Monkeys have again been declared vermin for the next one year in 11 districts' 91 tehsils and sub-tehsils of Himachal Pradesh. This notification would be applicable for a period of one year.

- The state government had urged the centre to declare Monkeys as vermin because the animals have been adversely affecting crops and causing harm to humans.
- In 2016, monkeys were declared as vermin in 38 tehsils and sub-tehsils of 10 districts in Himachal Pradesh.

What does the designation of Vermin mean?

- Vermin refers to pests or nuisance animals which spread diseases or destroy crops or livestock.
- Declaration of Vermin provides a reprieve for those who kill these animals in the specified areas for a year after these notifications, from the jail terms and fines that hunting these animals typically invite. The hunted wildlife is declared as government property and it imposes restrictions on how these carcasses must be disposed of.

Key points:

- Wildlife laws divide species into 'schedules' ranked from I to V. Schedule I members are the best protected, in theory, with severe punishments meted out to those who hunt them. Wild boars, nilgai and rhesus monkeys are Schedule II and III members — also protected, but can be hunted under specific conditions. Crows and fruit bat fall in Schedule 5, the vermin category.
- Section 11(1)a of the Wildlife Protection Act (WPA) authorizes chief wildlife warden to permit

hunting of any problem wild animal only if it cannot be captured, tranquillized or translocated.

- For wild animals in Schedule II, III or IV, chief wildlife warden or authorized officers can permit their hunting in a specified area if they have become dangerous to humans or property (including standing crops on any land).
- Section 62 of Act empowers Centre to declare wild animals other than Schedule I & II to be vermin for specified area and period.

Concerns:

Not many are happy with these decisions. These decisions raise questions about whether it is right to kill wildlife that damage crops. Culling (killing) or removal of "conflict" wildlife, often labelled "problem animals", is one among a suite of possible interventions recommended by conservation scientists and managers.

- Removal through capture or killing may not prevent recurrence of conflicts and may even exacerbate them. Himachal Pradesh, for instance, killed hundreds of rhesus macaques in 2007 with conflicts recurring within two years, sterilised over 96,000 macaques since 2007 while conflicts continued to increase.
- When animals are hunted, some will be shot several times causing tremendous pain, but many others escape with one gunshot or flesh wound, and die later slowly and in unimaginable agony from blood loss, gangrene, starvation or dehydration. When mother animals are killed, orphaned babies are left behind to starve.
- Provisions to allow wild animals to be killed can also be easily misused and contribute to the illegal wildlife trade. There is already a huge black market for nilgai body parts such as skin, teeth, nails and meat in Uttar Pradesh and wild boar are often used for meat.
- In parts of India, wildlife species such as wild pig, elephants, macaques, and nilgai occasionally damage crops or property. However, no reliable estimates of economic loss nationwide are available.

Reasons for possible human-wildlife interactions:

- Habitat loss: Deforestation and lowered green cover in cities has been driving animals into crop fields and human dwellings in search of food.
- Fall in predator population: Fall in population of predators such as tigers and leopards leads to a consequential rise in population of herbivores such as nilgai and deer.
- Drought: If natural calamities such as drought affect human beings, so is the case with animals in the forest. Drought dries up availability of food for

foraging driving wild animals into nearby crop fields and human dwellings in search of food.

- Humans feeding animals: this is one of the major problems these days. Tourists often offer foods to animals roadside. This habit makes them chase tourists expecting the same from all tourists.

Measures to reduce negative human-wildlife interactions:

- Crop damage by wildlife may occur when animals enter crop fields because of habitat alteration and fragmentation, because crops are edible, or because the fields lie along movement routes to forest patches or water sources. For this, site-specific scientific information is needed which helps design targeted mitigation with participation of affected people. This includes supporting local communities to install — and, more important, maintain on a sustained basis — bio-fencing and power fencing around vulnerable areas.
- Crop insurance for wildlife damage: An insurance approach recognises wildlife as a part of the shared countryside and as a risk to be offset rather than viewing wildlife as antagonists belonging to the State that one wishes away.
- Solutions such as adequate fencing, noisemakers, and repelling animals naturally from farms through the use of chilli plants or other such means can be tried. In Africa, for example, the planting of chilli plants around crops was found to be successful in addressing conflict with elephants.

Conclusion:

- A better approach to conflict management requires integration of scientific evidence, ecology and behaviour of particular species, and landscape and socio-economic context. Without this, the response of State authorities, often based on political compulsions and public perception, even if legitimate, may end up being inappropriate and confused in relation to the problem.

TOPIC: GS III, CONSERVATION, ENVIRONMENTAL POLLUTION AND DEGRADATION

13. Bramble Cay melomys is first mammal to go extinct due to climate change

Source: BBC

Why in news:

Climate change induced by human beings has claimed its first victim in ‘Class Mammalia’ of the ‘Animal Kingdom’: the Bramble Cay melomys — a ‘little brown rat’ found in Australia.

Key points:

- Also called the mosaic-tailed rat, the rodent is named after its home on Bramble Cay, a small island that is at most 10 feet above sea level.
- The animal seems to have disappeared from its home in the eastern Torres Strait of the Great Barrier Reef.
- The government of Australia’s Queensland province reported the species to be extinct in June 2016.
- It was placed in the IUCN (International Union for Conservation of Nature) Red List of Threatened Species.

TOPIC: GS III, CONSERVATION, ENVIRONMENTAL POLLUTION AND DEGRADATION

14. Cheetah Reintroduction Project

Source: The Hindu

Why in news:

The National Tiger Conservation Authority (NTCA) recently told a bench of the Supreme Court that African cheetahs would be translocated in India from Namibia and would be kept at Nauradehi wildlife sanctuary in Madhya Pradesh.

- International Union for Conservation of Nature (IUCN) has given a ‘no objection’ for the translocation.
- The decision to reintroduce spotted cheetahs in India was supported by Wildlife Institute of India, Dehradun.

About Cheetah:

- IUCN Status: Vulnerable
- Scientific name: *Acinonyx jubatus*
- The cheetah is one of the oldest of the big cat species, with ancestors that can be traced back more than five million years to the Miocene era.
- The cheetah is also the world’s fastest land mammal, an icon of nature. With great speed and dexterity, the cheetah is known for being an excellent hunter, its kills feeding many other animals in its ecosystem—ensuring that multiple species survive.
- The country’s last spotted feline died in Chhattisgarh in 1947. Later, the cheetah — which is the fastest land animal — was declared extinct in India in 1952.
- The reasons for extinction can all be traced to man’s interference. Problems like human-wildlife conflict, loss of habitat and loss of prey, and illegal trafficking, have decimated their numbers. The advent of climate change and growing human

populations have only made these problems worse. With less available land for wildlife, species that require vast home range like the cheetah are placed in competition with other animals and humans, all fighting over less space.

Cheetah reintroduction programme in India:

The Wildlife Institute of India at Dehradun had prepared a ₹260-crore cheetah re-introduction project six years ago. It was estimated that an amount of ₹25 crore to ₹30 crore would be needed to build an enclosure in an area of 150 sq km for the cheetahs in Nauradehi. The proposal was to put the felines in the enclosure with huge boundary walls before being released in the wild.

Nauradehi was found to be the most suitable area for the cheetahs as its forests are not very dense to restrict the fast movement of the spotted cat. Besides, the prey base for cheetahs is also in abundance at the sanctuary.

- According to the earlier action plan, around 20 cheetahs were to be translocated to Nauradehi from Namibia in Africa. The Namibia Cheetah Conservation Fund had then showed its willingness to donate the felines to India. However, the State was not ready to finance the plan contending that it was the Centre's project.

**TOPIC: GS III, CONSERVATION,
ENVIRONMENTAL POLLUTION
AND DEGRADATION**

15. Sustainable Alternative Towards

Affordable Transportation (SATAT)

Scheme

Source: PIB

Why in news:

Minister of Petroleum and Natural Gas, recently handed over the 100th Letter of Intent (LOI) to the Compressed Bio-Gas (CBG) Entrepreneur (producer) under the SATAT scheme.

About the SATAT initiative:

- SATAT was launched with a four-pronged agenda of utilising more than 62 million metric tonnes of waste generated every year in India, cutting down import dependence, supplementing job creation in the country and reducing vehicular emissions and pollution from burning of agricultural / organic waste.
- The initiative is aimed at providing a Sustainable Alternative Towards Affordable Transportation (SATAT) as a developmental effort that would benefit both vehicle-users as well as farmers and entrepreneurs.

- Compressed Bio-Gas plants are proposed to be set up mainly through independent entrepreneurs. CBG produced at these plants will be transported through cascades of cylinders to the fuel station networks of OMCs for marketing as a green transport fuel alternative.
- The entrepreneurs would be able to separately market the other by-products from these plants, including bio-manure, carbon-dioxide, etc., to enhance returns on investment.
- It is planned to roll out 5,000 Compressed Bio-Gas plants across India in a phased manner.
- This initiative is expected to generate direct employment for 75,000 people and produce 50 million tonnes of bio-manure for crops.

About Biogas:

- Bio-gas is produced naturally through a process of anaerobic decomposition from waste / bio-mass sources like agriculture residue, cattle dung, sugarcane press mud, municipal solid waste, sewage treatment plant waste, etc. After purification, it is compressed and called CBG, which has pure methane content of over 95%.

About CBG:

- Compressed Bio-Gas is exactly similar to the commercially available natural gas in its composition and energy potential. With calorific value (~52,000 KJ/kg) and other properties similar to CNG, Compressed Bio-Gas can be used as an alternative, renewable automotive fuel. Given the abundance of biomass in the country, Compressed Bio-Gas has the potential to replace CNG in automotive, industrial and commercial uses in the coming years.
- Compressed Bio-Gas can be produced from various bio-mass/waste sources, including agricultural residue, municipal solid waste, sugarcane press mud, distillery spent wash, cattle dung and sewage treatment plant waste. The other waste streams, i.e., rotten potatoes from cold storages, rotten vegetables, dairy plants, chicken/poultry litter, food waste, horticulture waste, forestry residues and treated organic waste from industrial effluent treatment plants (ETPs) can be used to generate biogas.

Benefits from converting agricultural residue, cattle dung and municipal solid waste into CBG on a commercial scale:

- Responsible waste management, reduction in carbon emissions and pollution.
- Additional revenue source for farmers.
- Boost to entrepreneurship, rural economy and employment.

- Support to national commitments in achieving climate change goals.
- Reduction in import of natural gas and crude oil.
- Buffer against crude oil/gas price fluctuations.

Way forward:

- The potential for Compressed Bio-Gas production from various sources in India is estimated at about 62 million tonnes per annum. Going forward, Compressed Bio-Gas networks can be integrated with city gas distribution (CGD) networks to boost supplies to domestic and retail users in existing and upcoming markets. Besides retailing from OMC fuel stations, Compressed Bio-Gas can at a later date be injected into CGD pipelines too for efficient distribution and optimised access of a cleaner and more affordable fuel.

TOPIC: GS III, CONSERVATION, ENVIRONMENTAL POLLUTION AND DEGRADATION

16. Major fire at Bandipur Tiger Reserve

Source: Indian Express

Why in news:

A major fire has broken out in the Bandipur Tiger Reserve and National Park in Chamarajanagar District of Karnataka. Due to the fire at the core area, huge damage and loss to the wildlife are expected.

- The extreme heat, the crackling-dry forest and high speed winds are making it that much more difficult for the 500-strong team involved in firefighting efforts.

About Bandipur Tiger Reserve and National Park:

- Bandipur Tiger Reserve and National Park spread over an area of about 874.2 sq km is situated in the Chamarajanagar District of Karnataka.
- Together with Mudumalai Wildlife Sanctuary in Tamil Nadu, Wayanad Wildlife Sanctuary in Kerala and Nagarhole National Park in the North, it creates the India's biggest biosphere reserve popularly known as the 'Nilgiri Biosphere Reserve'.
- Originally the Maharaja of Mysore created a sanctuary of 90 km² (35 sq mi) in 1931 and named it the Venugopala Wildlife Park. Later in the year 1973 Came into existence with an addition of nearly 800 km² (310 sq mi) to the Venugopala Wildlife Park.
- The Bandipur National Park is surrounded by the river Kabini in the north, River Moyar in the south and the River Nugu runs through the park. The Gopalswamy Betta which is a Hindu pilgrimage centre and it also forms part of the National Park.

- The park has a variety of biomes including dry deciduous forests, moist deciduous forests and shrublands.

V. INTERNATIONAL RELATIONS

TOPIC: GS II, INTERNATIONAL RELATION

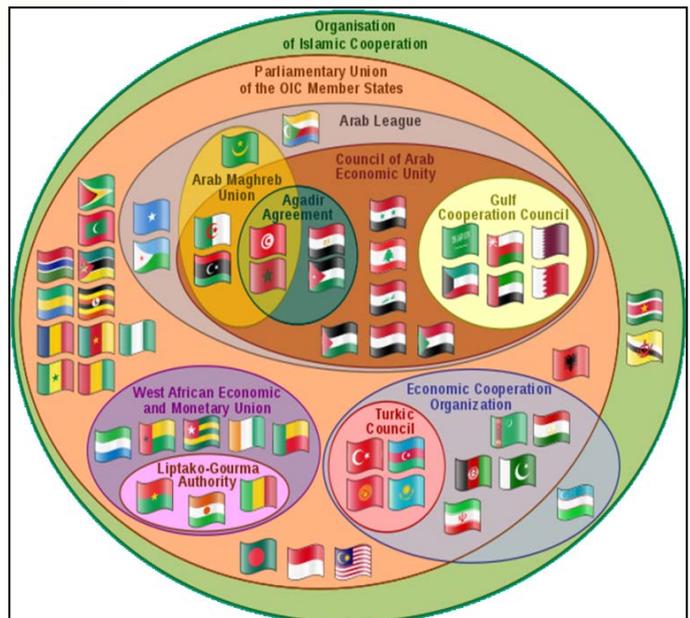
17. Organisation of Islamic cooperation

Why in news:

- India has been recently invited to the inaugural plenary of the foreign ministers' conclave of the OIC, a powerful grouping of Muslim majority nations.
- External Affairs Minister of India, is set to attend it in Abu Dhabi as the 'Guest of Honour'.

About Organisation of Islamic Cooperation (OIC) States:

- The OIC is a 57-member grouping of Muslim majority nations.
- The Organisation of Islamic Cooperation (OIC) is the second largest inter-governmental organization after the United Nations with a membership of 57 states spread over four continents.
- The Organization is the collective voice of the Muslim world. It endeavours to safeguard and protect the interests of the Muslim world in the spirit of promoting international peace and harmony among various people of the world.



Significance:

- According to Ministry of External Affairs, United Arab Emirates invited India's external minister as the 'Guest of Honour' to address the inaugural plenary.
- This invitation as the desire of the enlightened leadership of the UAE to go beyond our rapidly growing close bilateral ties and forge a true

multifaceted partnership at the multilateral and international level.

- This invitation is seen as a milestone in the comprehensive strategic partnership between both the countries.
- It is also a welcome recognition of the presence of 185 million Muslims in India and of their contribution to its pluralistic ethos, and of India's contribution to the Islamic world.
- Last year, Bangladesh proposed restructuring of the charter of the Organisation of Islamic Cooperation to pave way for the inclusion of non-Muslim countries like India as an "observer"

Conclusion:

- India has been consistently criticised by the OIC for its alleged human rights violations in Kashmir, often seen at the behest of Pakistan.
- Pakistan on its part had objected stating that any country wishing to get observer status should not be involved in any dispute with an OIC member state the reference being to the India-Pakistan dispute over Kashmir.
- With India moving to recraft and consolidate its ties with major Muslim countries in recent years, countries such as the UAE and Turkey besides Saudi Arabia have responded to India's overtures.

**TOPIC: GS II, INTERNATIONAL LAWS,
INTERNATIONAL RELATION**

18. Prisoner of War

Context:

- In response to Indian action against Jaish-e-Muhammad camp in Balakot, Pakistan, Pakistani Airforce attacked on Indian military installations.
- In this engagement, India lost one MiG 21. The pilot is missing in action and Pakistan has claimed that he is in their custody.
- India has cited the Geneva Conventions, 1949 while demanding the release of Wing Commander Abhinandan, who is in Pakistan's custody.

About the Geneva Conventions:

- The 1949 Geneva Conventions are a set of international treaties that ensure that warring parties conduct themselves in a humane way with non-combatants such as civilians and medical personnel, as well as with combatants who are no longer actively engaged in fighting, such as prisoners of war (POW), and wounded or sick soldiers.
- All countries are signatories to the Geneva Conventions.

Does the captured pilot count as a prisoner of war?

- The provisions of the conventions apply in peacetime situations, in declared wars, and in conflicts that are not recognized as war by one or more of the parties.
- India has said its airstrikes were a "non-military" intelligence-led operation — both sides are bound by the Geneva Conventions. This means the IAF officer is a prisoner of war, and his treatment has to be in accordance with the provisions for POWs under the Geneva Conventions.

What are the provisions for POWs?

- The convention is very exhaustive and deals with every kind of situation that may arise for a captive and captor, including the place of internment, religious needs, recreation, financial resources, the kinds of work that captors can make POWs do, the treatment of captured officers, and the repatriation of prisoners.
- Any unlawful act or omission by the Detaining Power causing death or seriously endangering the health of a prisoner of war in its custody is prohibited and will be regarded as a serious breach of the present Convention.
- In particular, no prisoner of war may be subjected to physical mutilation or to medical or scientific experiments of any kind which are not justified by the medical, dental or hospital treatment of the prisoner concerned and carried out in his interest.
- Likewise, prisoners of war must at all times be protected, particularly against acts of violence or intimidation and against insults and public curiosity.

What rights is a POW entitled to?

- Article 14 of the Convention lays down that POWs are "entitled to in all circumstances to respect for their persons and their honour".
- In captivity, a POW must not be forced to provide information of any kind under "physical or mental torture, nor any other form of coercion".
- Refusal to answer questions should not invite punishment. A POW must be protected from exposure to fighting. Use of POWs as hostages or human shields is prohibited, and a POW has to be given the same access to safety and evacuation facilities as those affiliated to the detaining power.
- Access to health facilities, prayer, recreation, and exercise are also written into the Convention. The detaining power has to facilitate correspondence between the POW and his family and must ensure that this is done without delays. A POW is also

entitled to receive books or care packages from the outside world.

What do the provisions say about the release of prisoners?

- Parties to the conflict “are bound to send back” or repatriate PoWs, regardless of rank, who are seriously wounded or sick, after having cared for them until they are fit to travel”. The conflicting parties are expected to write into any agreement they may reach to end hostilities the expeditious return of PoWs. Parties to the conflict can also arrive at special arrangements for the improvement of the conditions of the internment of PoWs, or for their release and repatriation.
- At the end of the 1971 war, India had more than 80,000 Pakistani troops who had surrendered to the Indian Army after the liberation of Dhaka. India agreed to release them under the Shimla Agreement of 1972.

Role of the International Committee of the Red Cross (ICRC):

- The Geneva Conventions have a system of “Protecting Powers” who ensure that the provisions of the conventions are being followed by the parties in a conflict.
- In theory, each side must designate states that are not the party to the conflict as their “Protecting Powers”. In practice, the International Committee of the Red Cross (ICRC) usually plays this role.
- During the Kargil War, Pakistan returned Flt Lt Nachiketa, who was captured after ejecting from his burning Mi27, after keeping him for eight days.
- This was after intense diplomatic efforts by the Vajpayee government and by ICRC. Another PoW, Squadron Ldr Ajay Ahuja, was killed in captivity.

VI. SCIENCE & TECHNOLOGY

TOPIC: GS III, INDIGENIZATION AND DEVELOPMENT OF NEW TECHNOLOGY

19. Atmospheric Water Generator (AWG)

Source: PIB

Why in news:

Navratna Defence PSU Bharat Electronics Ltd (BEL) has unveiled its new product, the Atmospheric Water Generator (AWG), an innovative solution to meet the ever-increasing need for drinking water worldwide, at Aero India 2019.

About AWG:

- The Atmospheric Water Generator is being manufactured by BEL in collaboration with CSIR-

IICT and MAITHRI, a start-up company based in Hyderabad.

- BEL’s Atmospheric Water Generator employs a novel technology to extract water from the humidity present in the atmosphere and purify it.
- It uses heat exchange for condensing the atmospheric moisture to produce pure, safe and clean potable water.
- The AWG comes with a Mineralisation Unit, which is used to add minerals which are required to make the water potable.
- The AWG is configurable in static and mobile (vehicular) versions and is available in 30 litres/day, 100 litres/day, 500 litres/day and 1,000 litres/day capacities.

Significance:

- The Atmospheric Water Generator can be used to provide drinking water in community centres and public places like health care centres, schools, colleges, offices, railway stations, bus stands, airports, sea ports, off-shore oil rigs, military establishments, remote field areas and remote establishments and residential complexes.

TOPIC: GS III, AWARENESS IN TECHNOLOGY

20. Govt. to launch a public DNS server

Source: Economic Times

Why in news:

The government will soon launch a public domain name system (DNS) server that could protect users from any malware or phishing with enhanced security features as well as faster response time.

Key points:

- If a user inadvertently accesses a malicious or phishing site, the new public system would immediately open up a page or popup to alert the user of such potential threat so that the suspicious resource could be avoided, the official who is aware of the initiative.
- The new DNS will be placed across the country to minimise outage and would be available round the clock. Users can simply use it by typing the IP number into the Internet browser.

Need:

- DNS is an important tool that requires to be fool-proof and has a major role in browsing the Internet. The government is eyeing a new and robust platform in the wake of critical digital services being delivered online requiring enhanced

security to discourage cyber-attacks and a quicker site loading time.

About DNS:

- DNS is a system that translates domain names to Internet Protocol or IP addresses that allows browsers to load websites sought.
- It is a database that stores all of the domain names and corresponding IP numbers for a particular top-level domain (TLD) such as .com or .net. The DNS identifies and locates computer systems and resources on the Internet.

TOPIC: GS III, SCIENCE AND TECHNOLOGY- DEVELOPMENTS AND THEIR APPLICATIONS AND EFFECTS IN EVERYDAY LIFE ACHIEVEMENTS OF INDIANS IN SCIENCE & TECHNOLOGY

21. National Science Day 2019

Source: DST

Why in news:

Every year February 28th, is celebrated as the National Science Day (NSD).

- The day commemorates the discovery of the Raman Effect by the Indian physicist, Sir Chandrasekhara Venkata Raman on the same day in the year 1928.
- For his great success in the field of science in India, Chandrasekhara Venkata Raman was awarded the Nobel Prize in the Physics in the year 1930.
- Theme for NSD 2019: “Science for the People and the People for Science.”

About Raman Effect:

- The Raman Effect is a change in the wavelength of light that occurs when a light beam is deflected by molecules. When a beam of light traverses a dust-free, transparent sample of a chemical compound, a small fraction of the light emerges in directions other than that of the incident (incoming) beam.
- Most of this scattered light is of unchanged wavelength. A small part, however, has wavelengths different from that of the incident light; its presence is a result of the Raman Effect.

VII. PRELIMS/MISCELLANEOUS

22. “Waste to Wonder” Park

- “Waste to Wonder” Park was recently inaugurated in South Delhi.
- The park sets an example of creation of ‘Wealth from waste’.

- The main attractions of the “Seven Wonders Park” are the different sized tall replicas of the Taj Mahal (20 ft.), the Great Pyramid of Giza (18 ft.), the Eiffel Tower (60 ft.), the Leaning Tower of Pisa (25ft.), Rio de Janeiro’s Christ the Redeemer statue (25 ft.), Rome’s Colosseum (15 ft.), and New York’s Statute of Liberty (30 ft.). The seven replicas have been made with the scrap of automobile parts and other metal waste like fans, rods, iron sheets, nut- bolts, bicycle & bike parts, defunct sewer lines and age old appliances gathering dust in the 24 Municipal Stores. In all 150 ton scrap/waste has been used.

23. India’s first indigenous semiconductor chips for 4G/LTE and 5G NR modems

- India’s first Indigenous Semiconductor Chips by Bengaluru based semiconductor company “SIGNALCHIP” for 4G/LTE and 5G NR MODEMS was recently unveiled.
- With this, India has entered into the elite club of the world and this will have huge implications for India’s data security and data sovereignty, besides the positive economic implications. At present only 8 companies and a few countries can design and build semiconductor chips.

24. Tata Steel recognised as one of World’s Most Ethical Companies

- Tata Steel has been recognised as one of World’s Most Ethical Companies by the Ethisphere Institute for 2019.
- Ethisphere Institute is a global leader in defining and advancing the standards of ethical business practices.
- For the eighth time, Tata Steel has got the recognition eight times in the ‘Metals, Minerals and Mining’ category. Tata Steel is one of the only two honorees in the ‘Metals, Minerals and Mining’ industry.

25. Afghanistan launches new export route to India through Iran

- Afghanistan began exports to India through an Iranian port as the landlocked, war-torn nation turns to overseas markets to improve its economy.

Key highlights:

- Chabahar port is the result of healthy cooperation between India, Iran and Afghanistan this will ensure economic growth.
- The Iranian port provides easy access to the sea to Afghanistan and India has helped developed this route to allow both countries to engage in trade bypassing Pakistan.

- Last year the US government granted an exception to certain U.S. sanctions that allowed development of Chabahar port as part of a new transportation corridor designed to boost Afghanistan's economy and meet their needs of non-sanctionable goods such as food and medicines. India has sent 1.1 million tonnes of wheat and 2,000 tonnes of lentils to Afghanistan through Chabahar.
- Both countries established an air corridor in 2017. Afghan exports to India stood at \$740 million in 2018, making it the largest export destination.

26. World Class Initiative in India

- Deloitte has announced the launch of its global initiative 'World Class' in India for the empowerment of women.

Key highlights:

- In India, the initiative aims to support 10 million girls and women by 2030 through education and skills development.
- To attain the objectives of World Class Initiative, Deloitte will align with organisations such as Katha and Pratham in India.
- World Class programme in India will focus on improving girl's retention rate in school, higher educational outcomes, and skills development for women to access employment.
- The initiative aims to give a boost to women education since almost 40 per cent of girls aged 15-18 years drop out of school and college, and only 26 per cent of women are employed.

Benefits:

- Through the World Class Initiative in India Deloitte aims to fuel India's growth story by aiding India to encash its demographic dividend.
- Globally, the World Class initiative seeks to prepare 50 million people by 2030, to be better equipped for the future of work, in-line with the United Nations' Sustainable Development Goals (SDGs).

27. National War Memorial

- The Prime Minister of India on February 25, 2019 dedicated the National War Memorial to the nation in a solemn ceremonial function in New Delhi.
- The National War Memorial is located near the India Gate in New Delhi.
- It is a fitting tribute to the soldiers who laid down their lives defending the nation, post-independence.

- The Memorial commemorates the soldiers who participated and made the supreme sacrifice in Peace Keeping Missions, and Counter Insurgency Operations.

Four concentric circles of Memorial:

- Amar Chakra or Circle of Immortality
- Veerta Chakra or Circle of Bravery
- Tyag Chakra or Circle of Sacrifice
- Rakshak Chakra or Circle of Protection

National War Memorial Complex:

- The National War Memorial complex includes a central obelisk (pillar), an eternal flame, and six bronze murals depicting famous battles fought by Indian Army, Air Force and Navy.
- Busts of the 21 awardees of Param Veer Chakra have been installed at Param Yoddha Sthal of the Memorial which also includes three living awardees – Subedar Major (Hony Capt) Bana Singh (Retd), Subedar Major Yogendra Singh Yadav and Subedar Sanjay Kumar.
- The Memorial complex is in harmony with the existing layout and symmetry of the majestic Rajpath and Central Vista.
- The complex is a commemoration of the sacrifices made by Indian soldiers since Independence with the names of 25,942 martyrs etched in stone forever.
- The memorial also has other features, such as artificial lighting in the evenings, and a walking plaza.
- The entry to the National War Memorial complex is free for all, but the main area and Param Yoddha Sthal will have timing restrictions.

28. Ayushman Bharat

- The National Health Authority (NHA) is planning to remove procedures covered under existing national programmes from the list of packages approved for reimbursement under PMJAY.
- This means procedures like cataract surgeries, dialysis and normal deliveries will not be covered by the flagship health scheme.

Achievement done in under PMJAY:

- PMJAY has just completed 150 days and our learning is that there is a need to streamline packages, so that there is no duplication.
- Procedures or diseases for which there is already an existing national programme, do not need to be covered under our packages.
- Cataract surgeries have topped the list of claims submitted under PMJAY.

- In the first three months of PMJAY until November 24, 2018 6,900 claims had been submitted for cataract surgeries even though they are done for free under the National Blindness Control Programme (NBCP).
- In 2017-18 alone, 15,91,977 surgeries were performed under NBCP, which dates back to 1976.
- While the board of the newly constituted health authority is yet to have its first meeting, the NHA with more than 1.5 crore cards already issued is looking at ways to ensure quality of services in hospitals that are empanelled under the programme.

29. Angkor

- A study has suggested that the Angkor, the ancient capital of the Khmer empire, appears to have suffered a gradual decline rather than a catastrophic collapse.
- Previously many archaeologists and historians have said that the abandonment of Angkor in 15th-century, was due to 1431 invasion by the Thai Kingdom from Ayutthaya.
- The city of Angkor is also home to UNESCO World Heritage Site, Angkor Wat.

Angkor Archeological Park:

- Angkor is one of the most important archaeological sites in South-East Asia. Stretching over some 400 km², including forested area, Angkor Archaeological Park contains the magnificent remains of the different capitals of the Khmer Empire, from the 9th to the 15th century.
- They include the famous Temple of Angkor Wat and, at Angkor Thom, the Bayon Temple with its countless sculptural decorations.

Angkor Vat Temple:

- Angkor Vat is a temple complex in Cambodia and one of the largest religious monuments in the world.

- It was originally constructed as a Hindu temple dedicated to the god Vishnu for the Khmer Empire, it was gradually transformed into a Buddhist temple towards the end of the 12th century.
- It was built by the Khmer King Suryavarman II in the early 12th century in Yaśodharapura (present-day Angkor), the capital of the Khmer Empire, as his state temple and eventual mausoleum.

30. Assam to penalize people ignoring parents

- The Assam government formed a three-member Commission for hearing cases under a pay-cut policy envisaged to make its employees take care of their dependent elderly parents and physically challenged siblings.

Key highlights of this initiative:

- The three-member PRANAM (Parents Responsibility and Norms for Accountability and Monitoring) Commission is headed by Chief Commissioner V.B. Pyarelal.
- Assam Finance Minister Himanta Biswa Sarma had in 2017 said that such a law would be introduced to ensure parents are cared for. Geriatric care was linked to the State government employees' pay from the 2018-2019 fiscal.
- The policy was enforced on October 2 last year.
- An employee would be liable to part with 10- 15% of his or her pay if found guilty of ignoring dependent parents and physically challenged siblings.
- The deducted money would then be transferred to the bank account of a parent or sibling.

Question:

1. Discuss the public perceptions and their attitudes about Police in India? How does All India Citizens Survey of Police Services will bring out useful suggestions for stakeholders in formulating and implementing appropriate policy responses?
2. Cash continues to be the most preferred mode of fare payments across public transport. Discuss the multiple challenges associated with the cash payment and suggest the measures for the same.
3. The regional languages are losing significance. In the light of above statement, highlight the significance of local languages and traditions and discuss the ways to preserve and protect the same.
4. Critically examine the provisions of the Criminal Law (Amendment) Act, 2018. Do you think that it is a significant initiative to promote the safety of women in their living spaces, working spaces and the public spaces?
5. Governments are making significant investments to harness the power of technology and foster innovation and public-private partnerships that support high quality, sustainable health and care for all. Comment on the statement in the light of India's Efforts towards Digital Health.
6. In Arunachal Pradesh, it has been a long-pending demand of six communities to get Permanent Residence Certificate and be recognised as residents of the state but the demand has run into trouble with powerful groups which oppose the same. Discuss the issue highlighted in the above statement and suggest the measures for the same.
7. In the light of recent deteriorating relation between India and Pakistan, discuss the significance of invitation to India to the inaugural plenary of the foreign ministers' conclave of the OIC, a powerful grouping of Muslim majority nations.
8. Describe the system of "Protecting Powers" and discuss the role of the International Committee of the Red Cross (ICRC) under the Geneva Conventions.