

Tribal Health in India

For Prelims: Tribal communities, Article 342, Tribal Health

For Mains: Healthcare challenges faced by tribal communities, Impact of infrastructure and workforce constraints on healthcare access

Why in News?

Recently, the healthcare challenges faced by **tribal communities in India** have come into focus. Despite India's remarkable achievements, such as emerging as the **world's 5th-largest economy** and its contribution to the **global vaccination drive**, tribal communities continue to experience significant healthcare disparities.

As India celebrates its accomplishments at India@75, it is crucial to address the urgent need for equitable healthcare access for tribal communities.

What is the Status of Tribal Communities in India?

- Demographic Status:
 - Tribal communities in India constitute a significant portion of the country's population, accounting for **approximately 8.9%.**
 - Out of the total Schedule Tribe population, approximately 2.6 million (2.5%) belong to <u>"Particularly Vulnerable Tribal Groups" (PVTGs)</u> known as the **"Primitive Tribes"** - the most disadvantaged of all the Schedule Tribe communities.
 - They are spread across various states, with higher concentrations in states like Madhya Pradesh, Maharashtra, Odisha, Chhattisgarh, Rajasthan, the NER states and the Andaman & Nicobar Islands.
- Cultural Status:
 - Tribal communities in India have their own rich and diverse culture, language, and traditions.
 - They have a symbiotic relationship with nature and depend on forests and hills for their livelihood.
 - They have their own beliefs, practices, and preferences regarding health, education, religion, and governance.
- Related Constitutional and Statutory Provisions:
 - Certain tribal communities in India are recognized as <u>Scheduled Tribes (STs)</u> under Article 342 of the <u>Constitution of India</u>.
 - They are entitled to special provisions and safeguards for their social, economic, educational, and political development.
 - Their interests are safeguarded by various laws and policies such as the 5th and 6gh
 Scheduled areas, Forest Rights Act 2006, and the PESA Act 1996.
 - They also have representation in the <u>Parliament</u> and State Legislatures through reserved seats.
 - <u>Draupadi Murmu</u> is India's first tribal <u>President.</u>
- Developmental Status:

- Tribal communities in India face multiple challenges and disadvantages in terms of poverty, illiteracy, malnutrition, health, employment, infrastructure, and human rights.
 - They lag behind the **national average on various indicators** of human development such as income, education, health, sanitation, and gender equality.
 - They also face **discrimination**, **exploitation**, **displacement**, **and violence from non-tribal people and institutions**. They have limited access to resources and opportunities for their empowerment and participation.

What are the Main Tribal Health Issues?

Malnutrition:

 Tribal people don't get enough food or the right kind of food to stay healthy. They suffer from hunger, stunting, wasting, anemia, and lack of vitamins and minerals.

Communicable Diseases:

 Tribal people are more likely to catch infectious diseases such as <u>malaria</u>, <u>tuberculosis</u>, <u>leprosy</u>, <u>HIV/AIDS</u>, <u>diarrhoea</u>, <u>respiratory infections</u>, <u>and diseases spread by insects</u> <u>or animals due to several factors like</u> poor sanitation and hygiene, and limited access to healthcare.

Non-Communicable Diseases:

- Tribal people are also at risk of getting chronic diseases such as diabetes, hypertension, cardiovascular diseases, cancer, and mental disorders.
 - According to a study, about 13% of tribal adults have diabetes and 25% have high blood pressure.

Addictions:

- The above-mentioned diseases can be caused by factors such as tobacco use, alcohol consumption, and substance abuse.
- More than 72% tribal men 15–54 years of age use tobacco and more than 50% consume alcohol against 56% and 30% non-tribal men, respectively.

What are the Challenges in Tribal Health?

Lack of Infrastructure:

- Inadequate healthcare facilities and infrastructure in tribal areas.
- Insufficient access to clean water and sanitation facilities.

Shortage of Medical Professionals:

- Limited presence of doctors, nurses, and healthcare professionals in tribal regions.
- Difficulty in attracting and retaining skilled healthcare personnel in remote areas.
- Imbalance in the distribution of healthcare professionals, with a concentration in urban areas.

Connectivity and Geographic Barriers:

- Remote locations and difficult terrain hinder access to healthcare services.
- Lack of proper roads, transportation facilities, and communication networks.
- Challenges in reaching tribal communities during emergencies and providing timely medical assistance.

• Affordability and Financial Constraints:

- Limited financial resources and low-income levels among tribal communities.
- Inability to afford healthcare expenses, including medical treatments, medicines, and diagnostics.
- Lack of awareness about available healthcare schemes and insurance options.

Cultural Sensitivities and Language Barriers:

- Unique cultural practices and beliefs that impact healthcare-seeking behavior.
- **Language barriers** between healthcare providers and tribal communities, leading to miscommunication and inadequate care.
- Lack of culturally sensitive healthcare services that respect tribal customs and traditions.

Limited Access to Essential Services:

- Insufficient availability of essential healthcare services, such as maternal and child health, immunization, and preventive care.
- Inadequate access to specialized care, diagnostic facilities, and emergency medical

- services.
- Limited awareness about health issues, preventive measures, and healthcare rights among tribal communities.
- Inadequate Funding and Resource Allocation:
 - Limited allocation of funds for healthcare in tribal areas.
 - Insufficient investment in healthcare infrastructure, equipment, and technology.
 - Lack of dedicated funding for addressing tribal health challenges and implementing targeted interventions.

What is the Gol's Report on Tribal Health in India?

- In 2018, an expert committee, constituted jointly by the Ministry of Health and Family Welfare and Ministry of Tribal Affairs released the <u>first comprehensive report on Tribal Health in India.</u>
- Recommendations of the Report:
 - Implement Universal Health Assurance under the National Health Policy (2017) in tribal areas.
 - Utilize **Aarogya Mitra**, trained **local tribal youth**, **and** <u>ASHA workers</u> for primary care in tribal communities with support from the gramsabha.
 - Provide financial protection through government medical insurance schemes for secondary and tertiary care.
 - Introduce **ST Health Cards for tribal people** living outside scheduled areas to facilitate access to benefits at any healthcare institution.
 - Implement a Tribal Malaria Action Plan in tribal-dominated districts under the National Health Mission.
 - Strengthen Home-Based Newborn and Child Care (HBNCC) programs to reduce infant and child mortality.
 - Enhance food security and strengthen <u>Integrated Child Development Services (ICDS)</u> **to address malnutrition.**
 - Publish a state of tribal health report every three years and establish a Tribal Health Index (THI) to monitor tribal health.
 - Establish a **National Tribal Health Council as an apex body,** along with Tribal Health Directorate and Tribal Health Research Cell, at both central and state levels.

Way Forward

- Addressing the disparity in health-seeking behavior and health-care delivery among tribal populations.
- Recognizing and acknowledging the services provided by traditional healers in tribal communities.
- Empowering tribal communities through health literacy programs to enable them to make informed decisions about their health.
- Implementing targeted recruitment and retention strategies to attract healthcare professionals to tribal regions. And Investing in the development of road networks, transportation facilities, and communication networks to enhance connectivity.

UPSC Civil Services Examination Previous Year Question (PYQ)

Prelims

Q1. Every year, a month long ecologically important campaign/festival is held during which certain communities/tribes plant saplings of fruit-bearing trees. Which of the following are such communities/ tribes? (2014)

- (a) Bhutia and Lepcha
- (b) Gond and Korku

- (c) Irula and Toda
- (d) Sahariya and Agariya

Ans: (b)

Q2. The provisions in Fifth Schedule and Sixth Schedule in the Constitution of India are made in order to (2015)

- (a) protect the interests of Scheduled Tribes
- (b) determine the boundaries between States
- (c) determine the powers, authority and responsibilities of Panchayats
- (d) protect the interests of all the border States

Ans: (a)

Q3. Under which Schedule of the Constitution of India can the transfer of tribal land to private parties for mining be declared null and void? (2019)

- (a) Third Schedule
- (b) Fifth Schedule
- (c) Ninth Schedule
- (d) Twelfth Schedule

Ans: (b)

Q4. If a particular area is brought under the Fifth Schedule of the Constitution of India, which one of the following statements best reflects the consequence of it? (2022)

- (a) This would prevent the transfer of land of tribal people to non-tribal people.
- **(b)** This would create a local self-governing body in that area.
- (c) This would convert that area into a Union Territory.
- (d) The State having such areas would be declared a Special Category State.

Ans: (a)

Mains

Q. What are the two major legal initiatives by the State since Independence addressing discrimination against Scheduled Tribes (STs)? **(2017)**

Source: IE

PBR and Biodiversity Management in India

For Prelims: People's Biodiversity Register (PBR), Biodiversity Management Committees (BMC), Biological Diversity Act 2002, Lifestyle for the Environment, Convention on Biological Diversity (CBD), Nagoya Protocol.

For Mains: Status of Biodiversity Management in India.

Why in News

The **National Campaign for Updation and Verification of People's Biodiversity Register (PBR)** was launched in **Goa**, marking a significant milestone in the **documentation and preservation of** <u>India's rich biological diversity</u>. It was organised by the Union Ministry of Environment, Forest and Climate Change.

■ Till now, **2,67,608 PBRs** have been prepared in the country.

What is the People's Biodiversity Register?

About:

- The People's Biodiversity Register serves as a comprehensive record of various aspects of biodiversity, including conservation of habitats, preservation of land races, folk varieties, and cultivars, domesticated stocks and breeds of animals, and micro-organisms.
- <u>Biodiversity Management Committees (BMC)</u> are created as per the <u>Biological</u>
 <u>Diversity Act 2002</u> for promoting conservation, sustainable use, and documentation of biological diversity.
 - Local bodies in the states and union territories constitute BMCs, which are entrusted with the preparation of People's Biodiversity Registers in consultation with local communities.

Importance:

- It helps in conserving biodiversity, which is key to maintaining balance in nature. It also enables local communities to share the benefits derived from genetic resources and associated traditional knowledge.
- It supports the implementation of the provisions of the Biological Diversity Act 2002, which aims to regulate access to biological resources and ensure fair and equitable benefit sharing.
- Being a bottom-up exercise, it is also a means of understanding the overlap of cultural and natural biodiversity.
 - It envisages a decentralised way through an inclusive approach.
- It aligns with the concept of <u>"Lifestyle for the Environment (LiFE)"</u>, introduced by the Indian Prime Minister at <u>COP26</u> in Glasgow.
 - This concept calls upon individuals and institutions globally to promote mindful and deliberate utilisation of resources to protect and preserve the environment.

What is the Status of Biodiversity Management in India?

About:

- With only 2.4% of the earth's land area, India accounts for 7-8% of the world's recorded species.
- 4 of the world's 36 biodiversity hotspots are located in India: The Himalayas,
 Western Ghats, Indo-Burma area, and Sundaland.
 - Two of these, the Indo-Burma area and Sundaland, are distributed throughout South Asia and are not precisely contained within India's formal borders.

Biodiversity Governance in India:

- India's Biological Diversity Act (BDA) 2002, is in close synergy with the <u>Nagoya</u>
 <u>Protocol</u> and aims to implement provisions of the <u>Convention on Biological Diversity</u> (CBD).
 - The Nagoya Protocol sought to ensure commercial and research utilisation of genetic resources led to sharing its benefits with the government and the community that conserved such resources.
- The BDA was hailed as an important step towards preserving India's vast

biodiversity, as it recognised the sovereign right of countries over its natural resources.

- It seeks to address issues of managing bio-resources in the most decentralised manner possible.
- It also envisages three layered structures:
 - The National Biodiversity Authority (NBA) at the national level.
 - The State Biodiversity Boards (SSBs) at the state level
 - Biodiversity Management Committees (BMCs) at the local level.
- The act also strengthens the country's stand with respect to anyone claiming an intellectual property right over biodiversity-related knowledge.
- Challenges related to Biodiversity Conservation:
 - Introduction of Invasive Species: <u>Invasive alien species</u> include plants, animals and pathogens that are non-native to an ecosystem cause environmental harm or adversely affect ecological balance.
 - According to CBD reports, invasive alien species have contributed to nearly 40% of all animal extinction.
 - Global Warming and Climate Change: It poses threats to plant and animal species as many organisms are sensitive to carbon dioxide concentration in the atmosphere that may lead to their disappearance.
 - Use of **pesticide**, **rise of tropospheric ozone**, **sulphur and nitrogen oxides from industries** also contribute to the degradation of natural ecosystems.
 - Choking Marine Biodiversity: Due to lack of efficient plastic waste management, microplastics are getting dumped into oceans choking and starving marine life and causing liver, reproductive, and gastrointestinal damage in animals and directly impacting marine biodiversity.
 - Genetic Modification Concern: Genetically modified plants impose high risks to the disruption of ecosystem and biodiversity because the engineering genes can result in the favouring of one organism.
 - Hence, it can eventually disrupt the natural process of gene flow and affect the sustainability of indigenous variety.

What is the Convention on Biological Diversity (CBD)?

- The Convention on Biological Diversity (CBD) was negotiated and signed by nations at the <u>Earth</u>
 <u>Summit at Rio de Janeiro</u> in Brazil on June 5, 1992.
 - The convention came into force on December 29, 1993. India became a party to the convention on February 18, 1994. At the present, there are 196 Parties to this Convention.
- CBD is a legally binding treaty and has 3 main objectives:
 - Conservation of biodiversity.
 - Sustainable use of the components of biodiversity.
 - Fair and equitable sharing of the benefits arising out of the utilisation of genetic resources.
- The Secretariat of the CBD is based in Montreal, Canada.

Way Forward

- Community-led Conservation: There is a need to engage local communities, including indigenous peoples, in the conservation efforts. Encourage their active participation by involving them in decision-making processes, establishing community-managed conservation areas, and recognizing their traditional knowledge and practices related to biodiversity conservation.
- Technology and Data-driven Conservation: There is a need to utilise emerging technologies such as remote sensing, drones, and artificial intelligence to monitor and track biodiversity changes, identify high-priority conservation areas, and assess the effectiveness of conservation interventions.
- Protecting Entire Biosphere: Conservation should not be limited to the species level but

should be about the conservation of the entire ecosystem, including the local communities.

• **India needs more** <u>biosphere reserves</u> to protect biodiversity and ensure sustainability of the ecosystem.

UPSC Civil Services Examination Previous Year Question (PYQ)

Prelims

Q1. Two important rivers - one with its source in Jharkhand (and known by a different name in Odisha), and another, with its source in Odisha - merge at a place only a short distance from the coast of Bay of Bengal before flowing into the sea. This is an important site of wildlife and biodiversity and a protected area. Which one of the following could be this? (2011)

- (a) Bhitarkanika
- (b) Chandipur-on-sea
- (c) Gopalpur-on-sea
- (d) Simlipal

Ans: (a)

Q2. With reference to India's biodiversity, Ceylon frogmouth, Coppersmith barbet, Graychinned minivet and White-throated redstart are (2020)

- (a) Birds
- (b) Primates
- (c) Reptiles
- (d) Amphibians

Ans: (a)

Mains

Q. How does biodiversity vary in India? How is the Biological Diversity Act,2002 helpful in the conservation of flora and fauna? **(2018)**

Source: PIB

Sengol to be Installed in New Parliament Building

For Prelims: <u>Central Vista redevelopment project</u>, <u>Parliament</u>, Sengol, <u>Chola Empire</u>, <u>Governor-General of India</u>, <u>Union Budget 2022-23.</u>

For Mains: Historical Significance of Sengol.

Why in News?

On **May 28th 2023**, the Prime Minister will inaugurate the **new** <u>Parliament</u> **building**, which is part of the <u>Central Vista redevelopment project.</u>

- One of the highlights of the event will be the installation of a historic golden sceptre, called Sengol, near the <u>Speaker's</u> seat.
- The Sengol is a **symbol of India's independence and sovereignty**, as well as its <u>cultural</u> <u>heritage</u> **and diversity.**

What is the Historical Significance of Sengol?

- The Sengol is profound in meaning, derived from the Tamil word "Semmai", it means
 "Righteousness". It was made of gold or silver and was often decorated with precious stones.
 - A Sengol sceptre was carried by emperors on ceremonial occasions, and used to represent their authority.
- It is associated with the <u>Chola Empire</u>, one of the longest-ruling and most influential dynasties in South India.
 - The Cholas ruled over parts of Tamil Nadu, Kerala, Karnataka, Andhra Pradesh, Telangana, Odisha, and Sri Lanka from the 9th to 13th century CE.
 - They were known for their military prowess, maritime trade, administrative efficiency, cultural patronage, and temple architecture.
- The Cholas had a tradition of handing over the Sengol sceptre from one king to another as a mark of succession and legitimacy.
 - The ceremony was usually performed by a high priest or a guru who blessed the new king and conferred him with the Sengol.

How did Sengol Become a Part of India's Independence?

- Before independence from the British rule in 1947, the then Viceroy Lord Mountbatten posed a question to the to-be Prime Minister Jawaharlal Nehru: "What is the ceremony that should be followed to symbolise the transfer of power from British to Indian hands?"
 - PM Nehru then consulted C. Rajagopalachari, commonly known as Rajaji, who went on to become the last <u>Governor-General of India</u>.
 - Rajaji suggested that the Chola model of handing over the Sengol sceptre could be adopted as a suitable ceremony for India's independence.
 - He said that it would reflect **India's ancient civilisation and culture,** as well as its **unity in diversity.**
 - The Sengol sceptre was presented to PM Nehru by Thiruvavaduthurai Adheenam (a 500-year-old Saivaite monastery) on August 14, 1947.
- A golden sceptre was crafted by Vummidi Bangaru Chetty, a famous jeweller in Madras (now Chennai).
 - The Nandi, with its unyielding gaze as the beholder of "Nyaya", is hand-carved at the top.



Where is Sengol Now and Why is it Being Installed in the New Parliament Building?

- After receiving the Sengol sceptre in 1947, Nehru kept it at his residence in Delhi for some time.
 - He then decided to donate it to Anand Bhavan Museum in Allahabad (now Prayagraj), his ancestral home.
 - The museum was established by his **father Motilal Nehru in 1930** to preserve the history and legacy of India's freedom movement.
 - The Sengol sceptre remained at Anand Bhavan Museum for over seven decades.
- In 2021-22, when the Central Vista redevelopment project was underway, the government decided to revive this historical event and install the Sengol sceptre in the new Parliament building.
 - It will be placed near the Speaker's seat in the new Parliament building and will be accompanied by a plaque that will explain its history and meaning.
- The installation of Sengol in the new Parliament building is not just a **symbolic gesture but also** a **meaningful message.**
 - It signifies that India's democracy is rooted in its ancient traditions and values and that it is inclusive and respectful of its diversity and plurality.

What is the Central Vista Redevelopment Project?

- The **Central Vista Redevelopment Project** is a project that aims to revamp the Central Vista, India's central administrative area located near Raisina Hill, New Delhi.
 - The area was originally designed by **Sir Edwin Lutyens and Sir Herbert Baker** during British colonial rule and was retained by Government of India after independence.
- In <u>Union Budget 2022-23</u>, the <u>Ministry of Housing and Urban Affairs</u> was allocated an amount of Rs 2,600 crore for the construction of non-residential office buildings of the ambitious Central Vista project, including the Parliament as well as the Supreme Court of India.

Source: PIB

Census

For Prelims: Census, Covid-19, Census of India Act of 1948, Demarcation of Constituencies, Migration, PDS.

For Mains: Census, its significance and implication of its Delay in framing Policy.

Why in News?

The 2021 **Census** in India had to be postponed for the first time in the past 150 years due to the Covid-19 pandemic. Despite the pandemic ending and the return to normalcy, the Census is still pending.

• It was initially proposed to be an entirely digital exercise, with all the information being fed into a mobile app by the enumerators. However, owing to 'practical difficulties', it was later decided to conduct it in 'mix mode', using either the mobile app or the traditional paper forms.

Note: According to the State of World Population report 2023 released recently by the UN Population Fund (UNFPA), India will overtake China to become the world's most populous country by the middle of 2023.

What is the Census?

Definition:

- he Vision Population Census is the total process of collecting, compiling, analyzing and disseminating demographic, economic and social data pertaining, at a specific time, of all persons in a country or a well-defined part of a country.
- · Census is the basis for reviewing the country's progress in the past decade, monitoring the ongoing schemes of the government and plan for the future.
- It provides an instantaneous photographic picture of a community, which is valid at a particular moment of time.
- Phases: The Census Operations in India are carried out in two phases:
 - Houselisting/Housing Census under which details of all buildings, permanent or temporary, are noted with their type, amenities, and assets.
 - Population Enumeration where more detailed information on each individual residing in the country, Indian national or otherwise is noted.
 - It is carried out after making a list of all households that are surveyed.

• Frequency:

- The first synchronous census was taken in 1881, by W.C. Plowden, Census Commissioner of India. Since then, censuses have been undertaken uninterruptedly once every ten years.
- The Census of India Act of 1948 provides the legal framework for carrying out the Census however, it does not mention its timing or periodicity.
 - Hence, a Census is Constitutionally mandated in India but there is no **Constitutional or legal requirement** that it needs to be conducted decennially.
- The 10-year frequency is followed in many countries (Ex. the US and the UK) but some countries like Australia, Canada, Japan conduct it every five years.

Nodal Ministry:

- The decennial Census is conducted by the Office of the Registrar General and Census **Commissioner**, Ministry of Home Affairs.
 - Until 1951, the Census Organisation was set up on an ad-hoc basis for each Census.

What is the Significance of Census?

Primary and Authentic Data:

- It generates primary and authentic data that forms the foundation of various statistical analyses. This data is essential for planning, decision-making, and development initiatives in various sectors, such as administration, economy, and social welfare.
- It is **not the legal requirement but the utility of the Census** that has made it a permanent regular exercise. **Reliable and up-to-date data is vital** as it influences the accuracy of indicators used in different aspects of India's progress.

Demarcation:

- Census data is utilized for <u>demarcation of constituencies</u> and allocation of representation in government bodies.
- It plays a crucial role in determining the number of seats to be reserved for <u>Scheduled</u> <u>Castes (SCs) and Scheduled Tribes (STs)</u> in Parliament, State legislatures, local bodies, and government services.
 - In the case of panchayats and municipal bodies, the reservation of seats for SCs and STs is based on their proportion in the population.
 - This ensures proportional representation and promotes inclusivity in the political and administrative systems.

Better Access for Businesses:

 The census data is also important for **business houses and industries** for strengthening and planning their business for penetration into areas, which had hitherto remained, uncovered.

Giving Grants:

• The <u>Finance Commission</u> provide grants to the states on the basis of population figures available from the Census data.

What can be the Consequences of Delaying Census?

Challenges in Framing Policy:

- A break in the Census periodicity can result in data that is not comparable to previous sets, creating challenges in analyzing trends and making informed policy decisions.
- Lack of reliable data 12-year-old data on a constantly changing metric is not reliable has
 the potential to upset every indicator on India and affect the efficacy and efficiency of
 all kinds of developmental initiatives.

Political Misrepresentation:

- Delaying the Census has consequences for the reservation of seats for SCs and STs in various governing bodies.
 - The data from the 2011 Census would continue to be used, which may result in inaccurate seat reservations.
- This is particularly problematic in towns and panchayats where there have been significant changes in population composition over the last decade.

Unreliable Estimates on Welfare Measures:

- The delay will impact government schemes and programmes, and would result in unreliable estimates from other surveys on consumption, health and employment, which depend on census data to determine policy and welfare measures.
 - As many as 100 million people are likely to be excluded from the government's food subsidy programme—the <u>Public Distribution System (PDS)</u>—as the population figures used to calculate the number of beneficiaries are from the 2011 census.

Impact on Houselisting:

- Houselisting takes nearly a year to complete, as it requires enumerators to locate addresses and gather relevant information. In India, houselisting is particularly crucial because the country lacks a robust address system.
- Delaying the census means that the list becomes outdated, as changes in households, addresses, and demographics occur over time.
 - This can result in **incomplete or incorrect information**, **leading to a less reliable foundation** for subsequent population enumeration and data collection

Lack of Migration Data:

- The outdated 2011 Census data couldn't provide answers to important questions regarding the numbers, causes, and patterns of migration.
 - During the Covid lockdown, the sight of migrant workers leaving cities and walking back to **their villages highlighted their challenges**.
- The government lacked information on the stranded migrants and their requirements for food relief and transportation support.
 - The upcoming Census is expected to capture the scale of migration towards smaller towns in addition to major cities, shedding light on healthcare and social service needs specific to migrants.
 - This data can help in identifying the necessary support and services required by migrants and their locations.

Way Forward

- The government should prioritize conducting the Census at the earliest possible time.
- Efforts should be made to leverage technology and innovative methods to streamline the data collection process.
- The government should allocate necessary resources and manpower to ensure a smooth and efficient Census operation.
- Timely completion of the Census is crucial for accurate data, informed policy decisions, effective governance, and inclusive development in various sectors.

UPSC Civil Services Examination Previous Year Question (PYQ)

Prelims

- Q. Consider the following statements: (2009)
 - 1. Between Census 1951 and Census 2001, the density of the population of India has increased more than three times.
 - 2. Between Census 1951 and Census 2001, the annual growth rate (exponential) of the population of India has doubled.

Which of the statements given above is/are correct?

- (a) 1 only
- **(b)** 2 only
- (c) Both 1 and 2
- (d) Neither 1 nor 2

Ans: (d)

Source: IE

Health for All: WHO

For Prelims: Health for All, <u>WHO</u>, <u>Climate Change</u>, <u>Covid-19</u>, World Health Assembly, <u>Paris Agreement</u>, <u>Universal Health Coverage</u>.

For Mains: Health for All: Transforming economies to deliver what matters.

Why in News?

Recently, the <u>World Health Organization (WHO)</u> in its 76th World Health Assembly (WHA) has released a report titled- "Health for All: Transforming economies to deliver what matters", recommending a roadmap to link health with sustainable growth.

- The 76th WHA was held in Geneva, Switzerland and the theme was "WHO at 75: Saving Lives, Driving Health for All".
- The report was launched by the **WHO Council on the Economics of Health (WCEH) for All**, which was formed in November 2020 in response to the **Covid-19 Pandemic.**

Note: WCEH for All was established to provide new economic thinking — reassessing how health and well-being are valued, produced and distributed across the economy.

What are the Highlights of the Report?

Covid-19 a Global Failure:

- The Covid-19 pandemic was a preventable disaster resulting from a global failure to prioritize the well-being of humanity. Despite clear warnings, the importance of proactive measures to safeguard against pandemics was neglected causing significant crises worldwide.
 - In 2020 alone almost 100 million were pushed into poverty.
 - Even the scientifically remarkable achievement of rapidly developing an effective vaccine against Covid-19 failed to prioritize the common good.
- Covid-19 exposed deep-seated inequities, emphasizing the need to reshape the economy for Health for All.

Shortage of Health Workers:

- There remains a huge shortage of health workers globally and especially in low-income countries.
 - Health workers, 70% of whom are women, unduly suffered on the frontline in the treatment of Covid-19 for **lack of decent protective equipment and support.**
- While Africa and the Eastern Mediterranean are the regions most in need, many countries struggle with constraints on their ability to invest in staff.

Climate Change:

- Given the disastrous consequences <u>Climate Change</u> is already having on health.
 - The <u>Paris Agreement</u>, aimed at combating climate change, is considered a crucial public health agreement. However, the goal of limiting temperature rise to
 1.5°C by 2050 may be surpassed within this decade.
- Worldwide, air pollution from burning fossil fuels is responsible for a global total of 10.2million premature deaths, roughly the population of Bangkok or Hyderabad.
 - Climate change may cause **83 million excess deaths by the end of the century** due to rising temperatures caused by **Greenhouse Gas Emissions**.

Health Expenditure:

- Short-term austerity measures threaten health expenditure, undermining long-term benefits and stability in healthcare provision.
- Insufficient long-term investments lead to increased reliance on aid and <u>Out-of-Pocket</u>
 <u>Payments</u>, hindering <u>Universal Health Coverage</u>.

Health as a Human Right:

- At least **140 countries recognize health as a human right** somewhere in their constitution but only four countries mention how to finance it.
 - 52 of these countries do little in practicing health as a human right.

What are the Recommendations?

Valuing Health for All:

- Valuing the Essential: Treat health and wellbeing, health workers and health systems as a long-term investment, not a short-term cost.
- Human Rights: Use legal and financial commitments to enforce health as a human right.
- **Planetary Health:** Restore and protect the environment by upholding international commitments to a regenerative economy which links the planet and people.
- **Dashboard for Healthy Economy:** Use a range of metrics that track progress across core societal values, above and beyond the narrow, static measure of GDP.

Financing Health for All:

- Long term Finance: Adopt a comprehensive, stable approach to funding Health for All.
- **Quality of Finance:** Redraw the international architecture of finance to fund health equitably and proactively, including an effective and inclusive crisis response.
- **Funding and Governance:** Ensure WHO is properly funded and governed to play its key global coordinating role in Health for All.

Innovating for Health for All:

- **Collective Intelligence:** Build symbiotic public-private alliances to maximize public value, sharing both risk and rewards.
- **Common Good:** Design knowledge governance, including intellectual property regimes, for the common good to ensure global equitable access to vital health innovations.
- Outcomes Orientation: Align innovation and industrial strategies with bold cross-sectoral missions to deliver Health for All

Strengthening Public Capacity for Health for All:

- Whole-Of-Government: Recognize that Health for All is not just for health ministries but for all government agencies.
- **State Capacity:** Invest in the dynamic capabilities of the public sector, institutionalizing experimentation and learning, to lead effectively in delivering Health for All.
- Build Trust: Demonstrate transparency and meaningful public engagement to hold governments accountable for the common good.

What is the World Health Assembly (WHA)?

About:

- The World Health Assembly (WHA) is WHO's decision-making body attended by delegations from all of WHO's member states.
- It is held yearly at the HQ of WHO, i.e., **Geneva, Switzerland.**
- A specific health agenda prepared by the Executive Board remains the focus of this assembly.
- Since the start of the Covid-19 pandemic, 2022's assembly is the first in-person assembly.

Functions of WHA:

- Deciding on Organization's policies.
- Appointment of the Director-General of WHO.
- Administration of financial policies.
- Review and approval of the proposed programme budget.

UPSC Civil Services Examination Previous Year Question (PYQ)

Mains

Q. Appropriate local community-level healthcare intervention is a prerequisite to achieve 'Health for All' in India. Explain. **(2018)**

Source: DTE

London Interbank Offered Rate (LIBOR)

For Prelims: London Interbank Offered Rate, Mumbai Interbank Forward Outright Rate (MIFOR), <u>RBI</u>, <u>Interest Rate</u>, <u>Repo Rate</u>, ARR, SOFR, <u>Derivatives</u>.

For Mains: Significance of Transition from London Interbank Offered Rate to alternate Reference Rate.

Why in News?

The <u>Reserve Bank of India (RBI)</u> has advised banks and other Regulated <u>Entities to move away from the London Interbank Offered Rate (LIBOR)</u> and transition to Alternative Reference Rates (ARR).

 The transition away from LIBOR is aimed at reducing reliance on a benchmark that is susceptible to manipulation and ensuring the financial system's stability and integrity.

What is LIBOR?

About:

- LIBOR is a widely used global benchmark interest rate. It represents the average interest rate at which banks estimate they can borrow from each other in the London interbank market for specific time periods.
- LIBOR is important because it is used as a reference rate for settling trades in various financial instruments such as futures, options, swaps, and other <u>Derivatives</u>.

Calculation:

- To calculate LIBOR, a group of banks submits their **estimated borrowing** rates to Thomson Reuters, a news and financial data company, every business day.
- The extreme rates are removed, and the remaining rates are averaged to determine the LIBOR rate, which aims to represent the median borrowing rate.
 - Previously, LIBOR was calculated for five major currencies and seven different time periods, resulting in 35 rates published each day.
 - However, the UK Financial Conduct Authority phased out most of these rates, and after 31st December, 2021, only U.S. dollar LIBOR rates were allowed to be published.

Significance:

- Many lenders, borrowers, investors, and financial institutions rely on LIBOR to determine interest rates and pricing for these transactions.
- Not only is LIBOR used in financial markets, but it also serves as a benchmark rate for consumer lending products like mortgages, credit cards, and student loans.
- It helps determine the interest rates that individuals and businesses pay on these loans.

Why is RBI Moving Away from LIBOR?

- Concerns Over Reliability and Integrity:
 - The RBI is moving away from LIBOR due to concerns over its reliability and integrity.
 - The central flaw in the LIBOR mechanism is its heavy reliance on banks to provide

honest and accurate reporting of their borrowing rates, without considering their commercial interests. This creates an opportunity for manipulation and misconduct.

- During the 2008 financial crisis, some banks **artificially lowered their LIBOR submissions** to project a more favorable image amid the crisis. Panelists were reporting significantly lower borrowing costs compared to other market measures.
- Issue of Integrity and Fairness:
 - There is a tendency for banks to alter their LIBOR submissions based on their trading units' derivative positions, aiming to generate higher profits.
 - This raises concerns about the integrity and fairness of the benchmark.

What is the Alternative to LIBOR?

- In 2017, the U.S. The Federal Reserve introduced the **Secured Overnight Financing Rate** (SOFR) as an alternative to LIBOR.
 - In India, new transactions were recommended to use SOFR along with the Modified Mumbai Interbank Forward Outright Rate (MMIFOR), replacing Mumbai Interbank Forward Outright Rate (MIFOR).
- SOFR, is based on observable repo rates. These rates reflect the cost of borrowing cash overnight and are collateralized by U.S. Treasury securities.
- Unlike LIBOR, which relied on expert judgment, SOFR is derived from actual transactions, making it less susceptible to market manipulation.
- MMIFOR, on the other hand, incorporates the adjusted SOFR rates, which are compounded retrospectively for different time periods. These rates are obtained from the Bloomberg Index Services, among other components.
 - The introduction of SOFR and MMIFOR aims to provide a more reliable and transactionbased benchmark for financial contracts, reducing the risks associated with LIBOR.

What are the Challenges in Shifting from LIBOR?

- There are many products linked to LIBOR which had to be redesigned with an Alternate Reference Rate (ARR) as the base.
 - Two working groups constituted by the association, receiving guidance from the RBI, helped develop the same.
- Transitioning from LIBOR to an ARR poses challenges in technology and legal aspects. These
 challenges involved dealing with existing contracts, making necessary modifications with
 counterparties, interbank entities, and borrowers.
- Banks need to undertake essential systemic and technical changes. These changes involve identifying products tied to LIBOR and determining the overall exposure. Banks also have to inform customers about the transition, incorporate fallback clauses in contracts to address scenarios where the reference rate is no longer available, assess the impact on their profit and loss statements, and make necessary adjustments to their technology platforms.

Way Forward

- Banks need to continue their efforts in redesigning products linked to LIBOR with the new ARR as the basis. The two working groups constituted by the association, with guidance from the RBI, play a crucial role in developing the necessary framework for this transition.
- To overcome the challenges in technology and legal aspects, banks must focus on handling existing contracts and making appropriate modifications with counterparties, interbank entities, and borrowers.
- Banks need to assess the impact on their profit and loss statements and make any required adjustments to their technology platforms to facilitate a smooth transition.

Source: TH

Advancements in Sodium-ion Batteries

Why in News?

Recently, Indian scientists have made a significant breakthrough in the development of <u>Sodium-ion (Naion) batteries</u> by creating new cathode materials that offer high performance, costeffectiveness, and environmental stability.

 This advancement addresses the challenges of air/water-instability and structural-cumelectrochemical instability in Sodium-transition-metal-oxide (Na-TM-Oxide) based cathode materials, leading to the production of stable and efficient energy storage systems.

What are the Newly Developed Cathode Materials?

About:

- Cathode material is the electrode where sodium ions are stored during the battery's discharge process.
 - It is responsible for the **electrochemical reactions that allow** the **flow of electrical current.**
- The newly developed cathode materials are known for being air/water-stable and highperformance.
 - They exhibit high electrochemical cyclic stability and stability upon exposure to air/water.

Significance:

- The newly developed cathode materials for Sodium-ion batteries offer high performance, cost-effectiveness, and environmental friendliness.
 - These materials are paving the way for the development of efficient and sustainable energy storage systems for various applications such as consumer electronics, grid energy storage, renewable energy storage, and electric vehicles.

What is Sodium-ion (Na-ion) Battery?

About:

- A sodium-ion battery is a type of rechargeable battery comparable to the ubiquitous lithium-ion battery, but it uses sodium ions (Na+) as the charge carriers rather than lithium ions (Li+).
 - The working principles behind and cell construction of a sodium-ion battery is virtually identical to those of lithium-ion batteries, but sodium compounds are used instead of lithium compounds.
- Sodium-ion batteries are currently emerging as a potential alternative to current <u>lithium-ion battery technology</u> due to their lower cost, higher availability, and reduced impact on the environment.

Importance:

- The growing significance of battery-driven_electric vehicles in addressing climate and environmental concerns necessitates the development of cost-effective, resourcefriendly, safe, and sustainable alkali metal-ion battery systems beyond conventional Lithium-ion (Li-ion) batteries.
- India's abundance of sodium sources makes the Na-ion battery system particularly crucial in the local context, offering a readily available and abundant resource for Naion battery production.

Challenges:

 The performance of Na-ion batteries depends on the structural and electrochemical stability of the electrodes, sodium-ion transport kinetics, and various dynamic resistances. However, the electrochemical behavior and stability of sodium based cathode materials needs significant improvements for widespread usage of Na-ion battery systems.

Source: PIB

Axolotis and Organ Renegration

Why in News?

The Axolotl, a species of <u>salamander</u>((lizard-like <u>amphibians</u>) possesses an extraordinary ability to regenerate lost body parts, inspiring researchers to delve into the secrets of this <u>unique</u> regenerative power.

The focus of their investigations lies in understanding the elusive o (for "ova deficient" gene, which plays a pivotal role in the axolotl's regenerative process.

What is Axolotl?



- About:
 - Axolotl are amphibians that spend their whole lives underwater. They exist in the
 wild in only one place—Lake Xochimilco near Mexico City, a network of artificial
 channels, small lakes, and temporary wetlands that help supply water to nearby
 Mexico City's 18 million residents.
 - Lake Xochimilco is also a UNESCO World Heritage site
 - Axolotls, like humans, contain two copies of every gene one inherited from the father and the other from the mother.
- Prey:
 - They feast on a menu of mollusks, worms, insect larvae, crustaceans, and some fish.
- Special Feature:
 - They have fascinated scientists for their ability to regenerate lost body parts and for their rare trait of neoteny, which means they retain larval features throughout life.
 - These features are also studied by cancer researchers for their unique **resistance to developing cancerous tissues.**

• Even though they are amphibians, axolotls remain aquatic throughout their lives but they are now almost extinct in the wild.

Threat:

 Axolotl populations have declined considerably due to a combination of habitat loss (largely driven by Mexico City's continued urbanisation), water pollution, and invasive fish species (such as carp and tilapia, which compete with axolotls for food and prey upon them).

Protection Status:

International Union for the Conservation of Nature and Natural Resources (IUCN)
has classified the axolotl as a <u>critically endangered</u> species since 2006.

What is Organ Regeneration?

About:

- Organ regeneration is the process of restoring or replacing damaged or missing organs or tissues in living organisms. It is a fascinating phenomenon that varies widely among different species, from plants to animals.
 - Organ regeneration has enormous potential for **medical applications**, such as treating injuries and diseases that affect human organs.

Major Processes:

- Remodelling: This involves reshaping and reorganising the existing tissues to form new structures.
 - For example, plants and some sea creatures, such as jellyfish, can replace missing parts by extensively remodelling their remaining tissues.
- Blastema formation: This involves growing a mass of undifferentiated cells at the site of injury that can differentiate into various cell types and form new tissues and organs.
 - For example, some animals such as salamanders can regenerate missing parts by first growing a blastema.
- **Compensatory hypertrophy:** This involves increasing the size and function of the remaining part of an organ to compensate for the loss of another part.
 - For example, in humans if one kidney is removed from a human, the other enlarges.
- Other Example of Organisms that can Regenerate Organs:
 - Planarians, Zebrafish and <u>Sea cucumber</u>.

Source: TH

Rapid Fire Current Affairs

India's Anti-Corruption Efforts for Women's Empowerment

In the upcoming <u>G20</u> **anti-corruption working group meeting in Rishikesh,** India will shed light on its experiences where <u>anti-corruption</u> **efforts have positively impacted** the <u>empowerment of women</u>. The meeting will cover a range of topics, including the impact of **graft on women**, the role of <u>audit institutions</u>, and the establishment of a common definition of economic offenders. India's initiative to explore the **intersection of gender sensitivity and anti-corruption strategies** will be highlighted in a separate event on the sidelines of the meeting.

India aims to deepen the commitment of <u>G20 nations</u> in countering corruption globally and

preventing economic offenders from seeking refuge in countries with lenient laws. Indian Prime Minister's Nine Point Agenda for Action Against Fugitive Economic Offences and Asset Recovery, presented during <u>Argentina's G20 Presidency in 2018</u>, resonates with the concerns of all G20 countries.

India is also compiling a compendium of good practices regarding the role of auditing in combating corruption, emphasizing **collaboration between Supreme Audit Authorities** and **anti-corruption bodies to enhance transparency and accountability in public finances.** This comprehensive approach demonstrates India's priority in strengthening the fight against corruption.

Read more: G-20 and Need for Multilateralism,

Indigenous Tribes Demand Total Separation of Manipur's Hill Areas

In Manipur, the Indigenous Tribal Leaders' Forum (ITLF) is a tribal leaders' forum in Manipur that describes itself as a conglomerate of the recognized tribes in Manipur's Churachandpu. It has called for the complete separation of the hill areas, inhabited primarily by the indigenous tribes of the Kuki-Chin-Zomi-Mizo group, from the rest of the state. The ITLF, representing the recognized tribes in Manipur's Churachandpur district, submitted a petition to the former CRPF chief, who was appointed as the security advisor to the Manipur government following recent ethnic clashes. The forum expressed their inability to coexist with the dominant Meiteis, accusing them of perpetrating endless atrocities and displaying hatred towards the tribal people.

Read more: Violence in Manipur, Demand of Meities for ST Status

Efforts to Resolve Assam and Meghalaya Border Dispute



The recent chief minister-level meeting between <u>Assam and Meghalaya</u> marked a significant step towards resolving the long-standing border disputes between the two states. With Assam and Meghalaya sharing an 884 km-long border that has witnessed frequent flare-ups, this meeting was the "beginning" of the resolution process for the remaining six disputed areas.

Since **July 2021**, they have been engaged in discussions to settle the disputes, and last March, 2022 they signed an MoU to address **six out of the twelve disputed areas**. The **six sectors where disputes** remain are Langpih, Borduar, Nongwah-Mawtamur, DeshDoomreah, Block 1 & Block II, and Psiar-Khanduli.

Additionally, the meeting decided to initiate visits to the disputed areas by three panels previously formed by both states. These developments indicate a renewed commitment to resolve the border issues and foster peace and stability in the region.

Read More: Assam-Meghalaya Border Dispute

The Changathi Project

The accomplishment of migrant workers in the Malayalam examination highlights the success of the Changathi project under the Kerala Literacy Mission.

Designed to address the exclusion faced by migrant labourers in society, this program aims to teach them to read and write Malayalam and Hindi. Recognizing the importance of socio-cultural integration, the literacy mission seeks to equip migrant workers with the necessary skills to understand the nuances of the state they reside in. The programme was first launched on August 15, 2017, in Perumbavoor, Kerala.

Through initiatives like Changathi, **migrant workers are being empowered,** breaking down barriers and **fostering greater inclusivity in society.**

Read More: Migrant Issues and Safeguards

