

August - 23

## TNPSC BITS

- ❖ Tamil Nadu government appointed incumbent Chief Secretary Shiv Das Meena as the Chairperson of the Tamil Nadu Real Estate Regulatory Authority (TNRERA).
- ❖ The Union Defence Minister released a ₹100 coin to commemorate the birth centenary of late DMK president M Karunanidhi.
- ❖ Union Defence Minister inaugurated a new Maritime Rescue Coordination Centre (MRCC) of the Coast Guard in Chennai.
- ❖ Japan's Prime Minister Fumio Kishida announced his resignation from the post next month.
- ❖ India will host the 3rd Voice of Global South Summit with the theme of 'An Empowered Global South for a Sustainable Future'.
- ❖ Thiruvananthapuram International Airport Limited (TIAL) has been awarded the prestigious Pollution Control Waste Recycling Excellence Award by the Greentech Foundation.
  - The award is for the excellence in 'zero waste to landfill' implementation undertaken by the TIAL.

## TAMIL NADU

### Evaluation of Schemes in the Tribal Villages

- ❖ According to the 2011 Census, there are 36 sub-groups of tribes in the Tamilnadu State.
- ❖ The main tribes among them are Malayali, Toda, Kurumbas, Paniyan, Irular, Kattunayakan, Kanikkar, Palliyan, and Kadar.
- ❖ Of these, Toda, Kota, Kurumbas, Kattunayakan, Paniyan, and Irular have been designated as 'Primitive Tribes'.
- ❖ The combined Scheduled Tribes population of the State, as per the 2011 Census, is 7.94 lakh, representing 1.10 per cent of the total population of the State (which is 721 lakh).
- ❖ Out of the 7.94 lakh tribal population, 50.5 per cent are males and 49.5 percent are females.
- ❖ The State Planning Commission (SPC) conducted a comprehensive evaluation of the implementation of government schemes in the densely-populated tribal districts of Salem, Kallakurichi, and Tiruvannamalai in the Eastern Ghats.

- ❖ It found persistent challenges pertaining to basic infrastructure, transportation, and education.
- ❖ There was a need to increase both the frequency and the number of government bus services.
- ❖ It had also found that the State government's free bus travel for women scheme was not available in this hilly region.
- ❖ There is a need to establish more schools and upgrade existing high schools into higher secondary schools to reduce dropout rates and increase enrolment.
- ❖ In the tribal area, there are no government or private polytechnic and arts and science colleges, except for the government ITI.
- ❖ Seasonal migration of entire families to other states for employment has also led to the discontinuation of their education.
- ❖ The study also found that over 97 per cent of households possess both a voter identity card and an Aadhaar card.
- ❖ Approximately 10 per cent of households have a savings account at a post office.
- ❖ More than 85 per cent have an account with a commercial bank.
- ❖ Over 60 per cent of households hold community certificates, whereas only 15 per cent have tribal identity cards.
- ❖ People were well aware of old and popular government welfare schemes but they were less aware of new schemes.

**Assessing outcomes**

The key findings of the State Planning Commission's survey on the implementation of government schemes in tribal districts

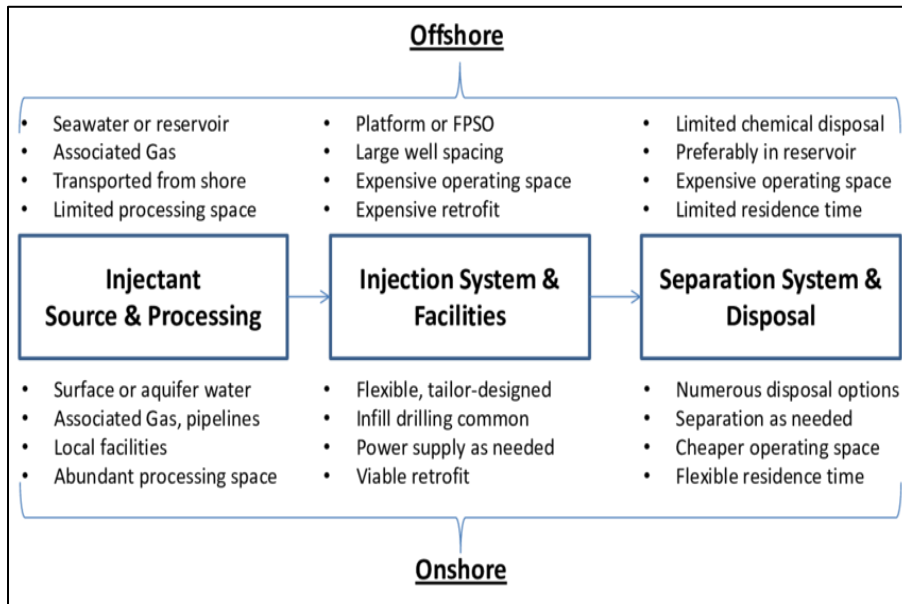
- Nearly 94% of the households have tiled or concrete roof; only 6% reside in thatched houses. Some people own their houses without external assistance, while a smaller number receive help from government schemes to build their houses
- In the three districts surveyed, 57% of the households have access to drinking water from public taps, and a smaller proportion - 18.6% - have direct pipe connections to their houses
- Nearly 95% of the households have access to electricity, but less than 50% have toilets. More than 40% of the tribal households still use firewood as the primary fuel for cooking
- As much as 75% of the respondents have a monthly income of up to ₹5,000, with the average food expenditure per household being ₹1,375 per month. The expenditure on fuel for vehicles is ₹1,013, with two-wheelers being the primary mode of transport
- People are well aware of old and popular government welfare schemes, and less aware of new schemes. Households have benefited from schemes related to housing, electricity, old-age pension, agriculture, health and education, but there are other schemes that have not reached them

## **NATIONAL**

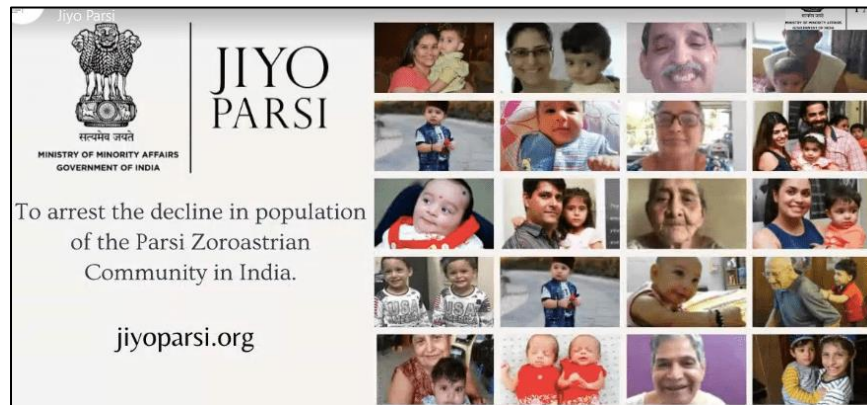
### **Offshore Areas Mineral Trust Rules 2024**

- ❖ It will be establishing the first-ever framework to oversee mineral exploration and production in India's offshore areas.

- ❖ Under the new rules, holders of production leases of offshore mines are required to contribute to the Trust by paying 10 per cent of their royalty payments to the government.
- ❖ This sum will be deposited in the Public Account of India, providing a financial backbone for the Trust's initiatives.
- ❖ The primary objective of the Trust is to promote sustainable exploration, while ensuring environmental conservation and community welfare.



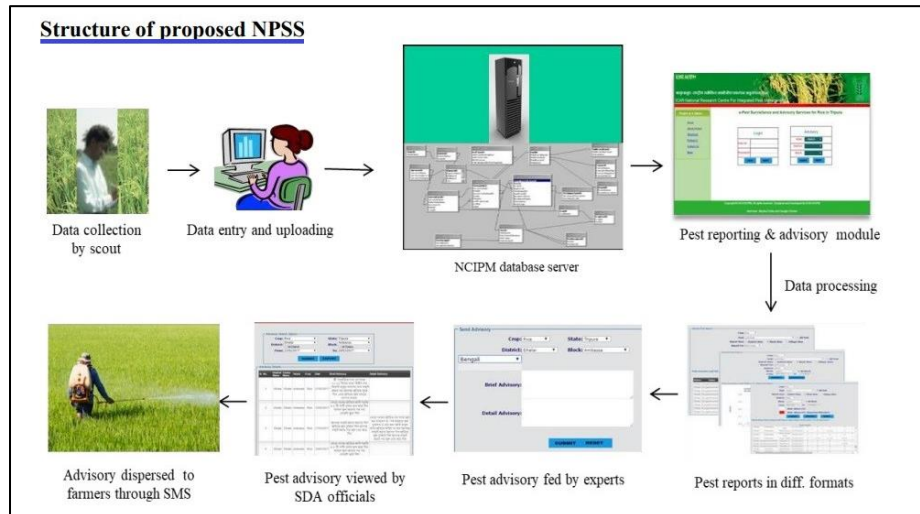
### Jiyo Parsi scheme portal



- ❖ Centre launched the Jiyo Parsi Scheme portal, a Central Sector Scheme to arrest the population decline of the Parsi community in India.
- ❖ It aims to reverse the declining trend of Parsi population by adopting a scientific protocol and structured interventions, and to stabilise their population.

- ❖ It provides the financial assistance to Parsi couples for medical treatment under standard medical protocol and towards childcare, and assistance to dependent elderly.

## National Pest Surveillance System



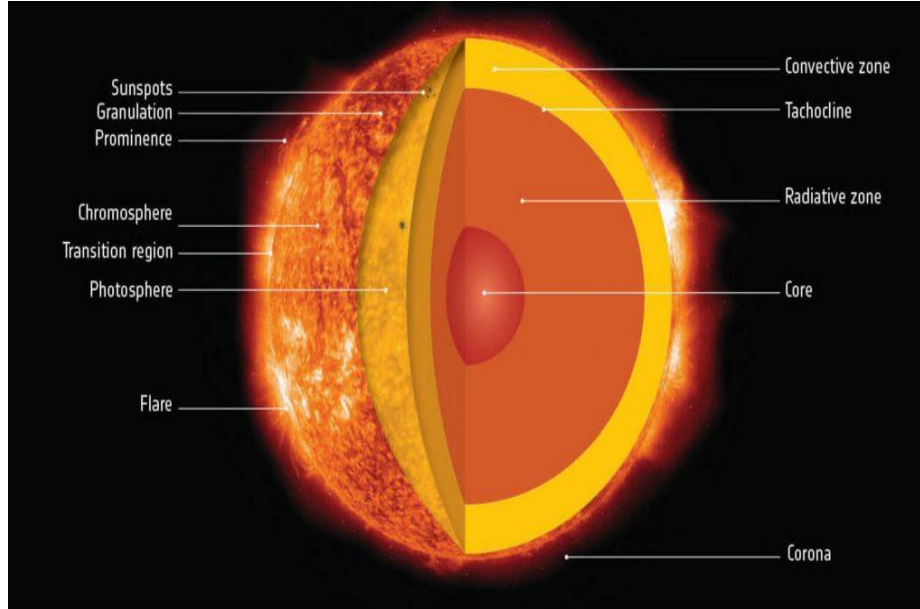
- ❖ The Union Government launched the AI-based National Pest Surveillance System (NPSS).
- ❖ This will help farmers to connect with agriculture scientists and experts on controlling pests using their phone.
- ❖ NPSS will analyse the latest data on pests using AI tools to help farmers and experts in pest control and management.
- ❖ Farmers can take photos of the infested crops or the insect using the NPSS platform and these will reach scientists and experts

## SCIENCE AND TECHNOLOGY

### New Method to Predict Solar Cycle Amplitude

- ❖ Astronomers from the Indian Institute of Astrophysics (IIA) have found a new method to predict the amplitude of the upcoming solar cycle.
- ❖ The astronomers have discovered a new correlation using 100 years of solar data from the IIA's Kodaikanal Solar Observatory.
- ❖ Space weather is concerned with the varying conditions within the solar system and its heliosphere influenced by the sun and solar wind.
- ❖ The main components of space weather are the solar wind, coronal mass ejections, and solar flares.

- ❖ They discovered that the width of the supergranular cells on the solar surface during the minimum year of the solar cycle is related to the number of sunspots seen during the subsequent solar cycle maximum.
- ❖ This simple method can be used in space weather forecasting.



## ENVIRONMENT

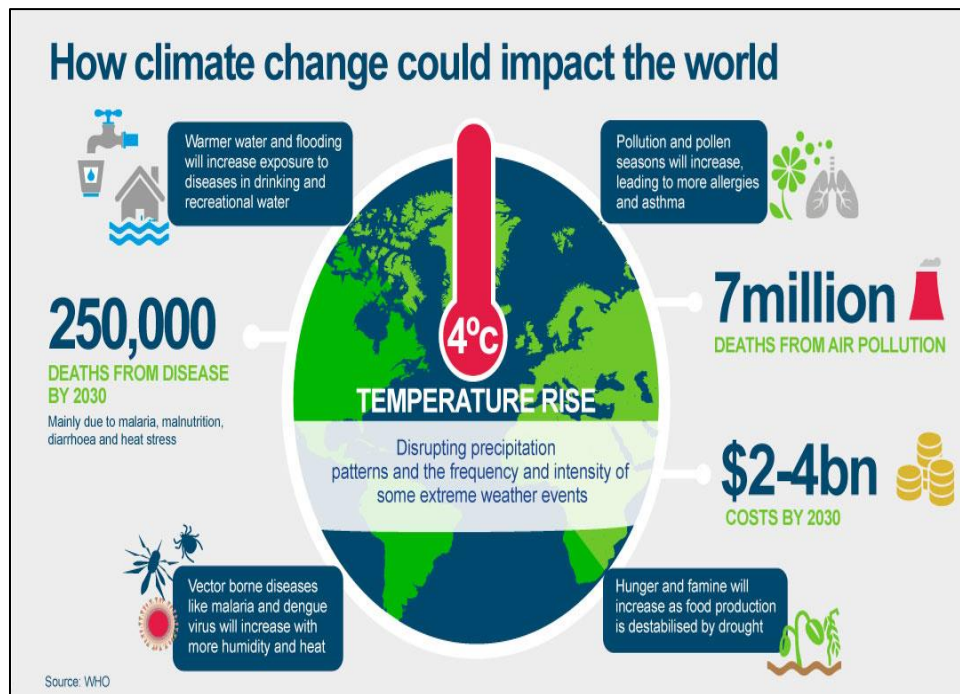
### **Gymnema sylvestre (Gurmar)**



- ❖ Researchers have identified *Gymnema sylvestre*, commonly known as Gurmar, among several medicinal plants on Brahmayoni Hill in Gaya, Bihar.
- ❖ Gurmar is known as anti-diabetic herb.

- ❖ CSIR has already utilized this medicinal herb in developing the anti-diabetic drug BGR-34.
- ❖ Gurmar is known for its unique ability to reduce blood sugar levels due to the presence of gymnemic acid.

## Earth's Rotational Dynamics

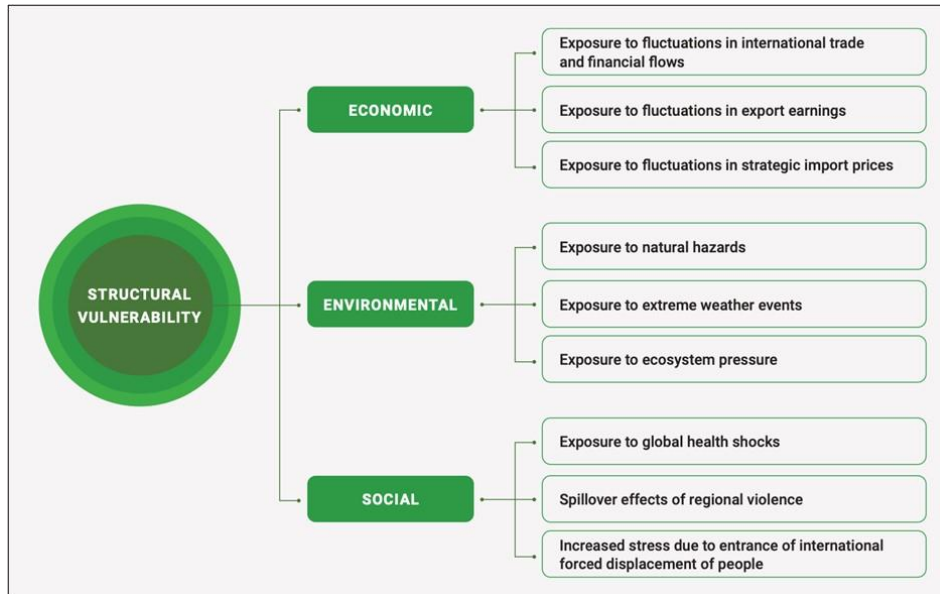


- ❖ Scientists had found that the melting polar ice caps have caused the earth to spin slower.
- ❖ This can lead to minuscule changes in the actual duration of a day.
- ❖ This is because angular momentum — a product of the moment of inertia and angular velocity — is conserved no matter how the skater is spinning.
- ❖ As the ice sheets melt, the earth's oblateness increases and the region around the equator elongates slightly.
- ❖ The moment of inertia increases and the rotation rate gets smaller.
- ❖ The changing climate's effects on sea levels around the equator have slowed the rate of earth's rotation by around 1.3 milliseconds (ms) per century.
- ❖ A process called lunar tidal friction, or the moon pulling on the earth's oceans, has already been slowing the planet's rotation at about 2 ms per century.
- ❖ So, if right now the earth takes about 2 ms longer to complete one day than the time predicted by atomic clocks.

- ❖ A 100 years later a day will be about 4 ms longer.
- ❖ As the milliseconds added up, leap seconds were added to keep pace with the earth's rotation.

## REPORTS AND INDICES

### Multidimensional Vulnerability Index



- ❖ The UN General Assembly has officially launched a new data-driven vulnerability index.
- ❖ It incorporates indicators linked to a state's structural vulnerabilities and lack of economic, environmental and social resilience.
- ❖ It would help small island states and developing nations gain access to low-interest financing.
- ❖ The "Multidimensional Vulnerability Index" (MVI) is set to act as a complement to GDP and other development metrics.
- ❖ Since the 1990s, small island developing states (SIDS) that are not poor enough in terms of GDP per capita to access low-interest development financing.

