

# NEWS TODAY

## India celebrates Janjatiya Gaurav Divas (Tribal Pride Day) to honour tribal freedom fighter Bhagwan Birsa Munda

- **Janjatiya Gaurav Divas** is celebrated on **15th November** (since 2021) to recognize the efforts of the tribal freedom fighters.
  - ⊖ **India's freedom struggle** was strengthened by tribal movements by **Santhals, Tamars, Kols, Bhils, Khasis and Mizos etc.**
  - ⊖ The date is the **birth anniversary of Sri Birsa Munda** who is revered as Bhagwan by tribal communities across the country.
- **About Birsa Munda (1875-1900)**
  - ⊖ **Early life:** Birsa Munda also known as **Dharti Aaba**, was born in **Munda tribe** at **Ulihatu, Khunti district of Chotanagpur Plateau region (Jharkhand)**.
  - ⊖ **Social reforms:** He stressed on the importance of **prayer, staying away from alcohol**, having faith in God and observing a code of conduct.
    - ◆ **Based on these, he started the faith of Birsait.**
  - ⊖ **Ulgulan movement :** Birsa started a movement called '**Ulgulan**', or '**The Great Tumult**' against the exploitation and discrimination against tribals.
    - ◆ **Led to Chotanagpur Tenancy Act being passed in 1908** which restricted the passing on of land from the tribal people to non-tribals.
  - ⊖ **Ethical Values:** Perseverance, courage, and resilience.
- On this occasion government launched **Viksit Bharat Sankalp Yatra** and **PM Janjati Adivasi Nyaya Maha Abhiyan (PM JANMAN)**.



## PM Janjati Adivasi Nyaya Maha Abhiyan (PM JANMAN) launched

- **About PM JANMAN**
  - ⊖ It aims to protect the tribes on the verge of extinction and nurture them.
  - ⊖ Earlier in Budget 2023, PM PVTG Mission was announced to improve the socio-economic conditions of Particularly Vulnerable Tribal Groups (PVTGs).
  - ⊖ **Projects worth 24000 crore** for overall developments of PVTGs.
  - ⊖ **Mission based on providing basic amenities** like safe housing, clean drinking water, education, health, road and sustainable livelihood etc.
  - ⊖ **Focus on complete coverage of various schemes** like Ayushman Bharat yojana, TB elimination, 100% vaccination, PM Surakshit Matritva Yojana, PM Poshan, etc.
- **About PVTGs**
  - ⊖ **Most underprivileged and deprived tribal communities in India.**
  - ⊖ Characterized by "**pre-agriculture level of technology, stagnant or declining population, extremely low literacy, and Economic backwardness**".
  - ⊖ **Centre had started identification of PVTGs in 1975** on the findings of the **1961 Dhebar Commission**.
  - ⊖ **75 PVTGs in 18 States & UTs** living in 220 districts having a **population of around 28 lakhs**.
    - ◆ As per 2011 Census, **Odisha has the largest population of PVTGs.**
- **Viksit Bharat Sankalp Yatra** was also launched which will continue till 26th January, 2024 to ensure saturation of flagship government welfare schemes.

### Other Initiatives Empowering Tribal Communities:

- ⊖ **Eklavya Model Residential Schools:** Provide free education to ST children from class VI to XII in residential set up.
- ⊖ **Pradhan Mantri Vanbandhu Vikas Yojana :** A venture capital fund has been set up to promote entrepreneurship/start-up projects by ST youth.
- ⊖ **National Sickle Cell Anaemia Elimination Mission & PM Adi Adarsh Gram Yojana etc.**



## NASA-ISRO Synthetic Aperture Radar (NISAR) Satellite

- ISRO has successfully conducted a 21-day-long thermal vacuum test for the upcoming launch of the NISAR satellite in 2024.
  - ⊖ A thermal vacuum test is tested in a facility that mimics expected flight conditions.
- About NISAR
  - ⊖ It is a Low Earth Orbit (LEO) observatory being jointly developed by NASA and ISRO.
  - ⊖ NISAR will map the entire globe in 12 days and provide consistent data for understanding changes in Earth's ecosystems, ice mass, etc.
  - ⊖ It 2,800 kilograms satellite consists of both L-band and S-band synthetic aperture radar (SAR) instruments, which makes it a dual-frequency imaging radar satellite.
    - ◆ L-band radars are used for clear air turbulence studies and S-band radars are useful for weather observation.
  - ⊖ It has a 39-foot gold mesh antenna reflector that focuses radar signals from the upward-facing instrument.
- Significance of NISAR
  - ⊖ Large imaging area (>240km) allows full earth imaging in 12 days.
  - ⊖ High precision and resolution (<1 cm) due to dual-band radars.
  - ⊖ Monitors Indian coasts, Antarctica, and deltaic region bathymetry changes.
  - ⊖ Observe ecosystem disturbances, ice sheet collapses, and natural hazards.

### Applications

- ⊖ **Ecosystem and Resource Tracking:** Measurement of forest cover and land usage, Oil and Gas exploration, water resources, etc.
- ⊖ **Disaster Management:** tracking the source of earthquakes, landslides, and oil spills and mapping the aftereffects of the disaster.
- ⊖ **Cryosphere tracking:** changes in the permafrost, ice sheets glaciers, etc.

## Computer Emergency Response Team (CERT-In) releases Annual Report 2022

- CERT-In is the national nodal agency for responding to computer security incidents.
  - ⊖ It was established in 2004 and functions under aegis of Ministry of Electronics and Information Technology.
  - ⊖ Under the Information Technology (Amendment) Act 2008, it is mandated to provide Incident Prevention, Response, and Security Quality Management Services.
  - ⊖ It operates 24x7.
- Key Highlights
  - ⊖ CERT-In handled around 13.9 Lakh cyber security incidents in 2022.
  - ⊖ There is an increase in phishing attacks, malware attacks, and vulnerable services.
  - ⊖ Approx, 20,000 Website Defacements (WD) tracked and most attacks on '.in' domain websites.
    - ◆ WD is a type of cyberattack that alters or compromises the contents of a website.
  - ⊖ Cyber Swachhta Kendra notifies about botnet/malware to ~94% of subscribers.
    - ◆ A botnet, blending 'robot' and 'network', uses interconnected compromised computers for cyber activities."
- Importance of Cyber Security: includes protection of critical infrastructures, Government initiatives like Digital India, and protection of businesses and individuals from potential cyber threats.
- Challenges in handling Cyber threats:
  - ⊖ lack of critical cyber security infrastructure, shortage of cybersecurity professionals.
  - ⊖ Evolving threat landscape in Cyber security e.g., involvement of non-state actors, organized crime.
  - ⊖ Increase in proliferation of connected devices, new technology Internet of Things (IoT) etc.

### Government initiatives to tackle Cyber Threats

- ⊖ Indian Cyber Crime Coordination Centre (I4C) was established to provide a framework and eco-system for enforcement agencies to deal with cyber crimes
- ⊖ National Cyber Crime Reporting Portal launched to enable the public to report incidents of cyber crimes
- ⊖ A toll-free number- 1930 has been operationalized to assist with online cyber complaints.

## India, U.S., 12 other members of the Indo-Pacific Economic Framework For Prosperity (IPEF) ink supply chain resilience agreement

- IPEF (launched in 2022) is a U.S.-led framework to solidify relationships with partner countries and engage in crucial economic and trade matters that concern the region. It is not a free trade agreement.
  - ⊖ 14 partner countries of IPEF: Australia, Brunei, Fiji, India, Indonesia, Japan, Republic of Korea, Malaysia, New Zealand, Philippines, Singapore, Thailand, Vietnam and the US.
  - ⊖ The IPEF partners represent 40% of global GDP and 28% of global goods and services trade.
  - ⊖ IPEF has 4 pillars. India has joined all pillars except the trade one (refer image).
- About the agreement:
  - ⊖ It aims to fortify and strengthen global supply chains; and foster adaptability, stability and sustainability.
  - ⊖ The agreement comes into force after implementation by any of the five member countries.
  - ⊖ IPEF Supply Chain Council will monitor and implement the agreement.
- Key Benefits of the pact for India:
  - ⊖ To mitigate economic risks and provide alternatives for critical sectors, enabling members to diversify and decrease dependency on Chinese supply chains.
  - ⊖ Mobilization of investments for economic growth.
  - ⊖ Deeper integration of India into global value chains.
  - ⊖ Creation of a seamless regional trade ecosystem to facilitate the flow of Indian products.

### Four Pillars of IPEF

- Pillar I - Trade,
- Pillar II - Supply chains,
- Pillar III - Clean energy, Infrastructure and decarbonization, and
- Pillar IV - Tax and Anticorruption.

## Greenhouse Gas Bulletin released by the World Meteorological Organisation (WMO)

- **Greenhouse Gas Bulletin** analyses data from the WMO Global Atmosphere Watch (GAW) Programme.
  - ⊖ GAW provides information on atmospheric composition to the public; it consists of a worldwide measuring network of observation stations and scientific infrastructure.
- **Greenhouse Gas Bulletin** compares current global carbon dioxide (CO<sub>2</sub>), Methane (CH<sub>4</sub>), and Nitrous oxide (N<sub>2</sub>O) levels with last years and pre-industrial level (before year 1750)
  - ⊖ It also provides insights on Radiative forcing changes by long-lived GHGs (LLGHGs) like CO<sub>2</sub>, CH<sub>4</sub>, and CFCs.
- **Key Highlights**
  - ⊖ Global average CO<sub>2</sub> concentrations reached 417.9 ppm in 2022, representing a 150% increase from pre-industrial levels.
  - ⊖ Methane (CH<sub>4</sub>) and Nitrous Oxide (N<sub>2</sub>O) concentrations increased by 264% and 124% respectively from pre-industrial levels in 2022.
  - ⊖ From 1990 to 2022, radiative forcing by LLGHGs increased by 49%, with CO<sub>2</sub> accounting for about 78% of this increase.
- **Challenges in addressing GHGs, the drivers of climate change:**
  - ⊖ **Feedback Mechanism:** Climate change has multiple feedback loops including increased carbon emissions from soils and reduced carbon uptake by oceans and forests.
  - ⊖ **Tipping points:** Climate may reach Tipping points i.e., thresholds triggering self-accelerating, potentially irreversible changes.
  - ⊖ **Natural variability:** CO<sub>2</sub>, CH<sub>4</sub>, and N<sub>2</sub>O levels vary due to natural processes like El Niño.

- **About Radiative forcing by long-lived GHGs**
  - ⊖ Radiative forcing represents the amount of energy per unit area that is added or removed from the climate system.
  - ⊖ It is the measure of how much these gases affect the Earth's energy balance. These gases trap some of the heat that would otherwise escape to space, causing the planet to warm up.
- **About WMO:**
  - ⊖ **About:** specialized agency of the United Nations (UN).
  - ⊖ **H/Qs:** Geneva, Switzerland.
  - ⊖ **Genesis:** Established in 1950.
  - ⊖ **Members:** 187 Member States (including India) and 6 Member Territories.

## Also in News



### Coconut Development Board

- Coconut Development Board (CDB) has officially launched the "Hello Naariyal," Friends of Coconut Tree call centre for coconut harvesting and other plant management practices.
- **About CDB**
  - ⊖ CDB is a statutory body established under the Coconut Development Board Act, of 1979.
  - ⊖ **Nodal Ministry:** Ministry of Agriculture and Farmers Welfare.
  - ⊖ **Headquarters:** Kochi in Kerala.
- **Mandate:** integrated development of coconut cultivation and industry in the country with focus on productivity increase and product diversification.



### Kill Switch For Cancer Cells

- Scientists have reportedly discovered a 'kill switch' that triggers death of cancer cells.
- They have identified a crucial epitope (a protein section that can activate the larger protein) on the CD95 receptor that can cause cells to die.
- **CD95 receptors- also referred to as Fas -** send a signal that causes cancer cells to self-destruct.
- **Future cancer drugs could boost the activity of these CD95 receptors** to create a new weapon against cancer tumors,
- **Cancer have been treated historically with surgery, chemotherapy and radiation.**



### National Institute of Disaster Management (NIDM)

- NIDM recently got global recognition as 'centre of excellence' on landslide disaster reduction for the period 2023-2026.
- NIDM is a statutory organisation under the National Disaster Management Act 2005 (under Ministry of Home Affairs).
  - ⊖ It is tasked with human resource development, capacity building, training, research, documentation, and policy advocacy in the field of disaster management.
  - ⊖ Union Home Minister is President of NIDM.



### Innovation Handshake

- India and the US launched 'Innovation Handshake' to deepen bilateral tech ties.
  - ⊖ Both sides signed an MoU on "Enhancing Innovation Ecosystems through an Innovation Handshake".
- Innovation Handshake, as a concept was developed under the US-India Commercial Dialogue for better cooperation in Critical and Emerging Technologies (CET)
- **Objectives:**
  - ⊖ Connect the dynamic startup ecosystems,
  - ⊖ Address regulatory hurdles to cooperation,
  - ⊖ Share information and best practices for startup fundraising and
  - ⊖ Promote innovation in CET.



**World Bank's Worldwide Governance Indicators (WGI)**

- Recently, Chief Economic Adviser raised concerns over the use of World Bank's WGI in ratings assessment by credit ratings agencies, especially for emerging economies.
- WGI are designed to help researchers and analysts assess broad patterns in perceptions of governance across countries and over time.
- WGI provide a ranking of 215 countries territories based on six dimensions of governance:
  - ⊖ Voice and Accountability;
  - ⊖ Political Stability and Absence of Violence;
  - ⊖ Government Effectiveness;
  - ⊖ Regulatory Quality;
  - ⊖ Rule of Law
  - ⊖ Control of Corruption.



**Mount Etna Volcano (Italy)**

- Italy's volcano begun erupting again on island of Sicily
  - ⊖ Mount Etna is the **highest active volcano in Europe** and is the most active stratovolcano in the world.
- **About Volcanos :** Volcanoes are openings, or vents where lava, tephra (small rocks), and steam erupt onto the Earth's surface.
  - ⊖ Volcanoes can be on **land and in the ocean.**
  - ⊖ **Ring of Fire, also referred to as the Circum-Pacific Belt,** is a path along the **Pacific Ocean** characterized by active volcanoes and frequent earthquakes.
  - ⊖ **4 main types of volcanoes:** cinder cones, composite or stratovolcanoes, shield volcanoes and lava domes.



**Tadoba Andheri Tiger Reserve**

- Recently a tiger was killed in a territorial fight.
- **About Tiger Reserve (Chandrapur- Maharashtra)**
  - ⊖ **Location:** The reserve falls in the Central Plateau province of the Deccan peninsula.
  - ⊖ **Vegetation:** tropical dry deciduous forests and typical Central Indian faunal assemblage.
  - ⊖ **Flora:** Teak, Ain, Bamboo, Bija, Dhaoda, Haldu, Salai, Semal and Tendu. **Bamboo is spread over 40% of the habitat.**
  - ⊖ **Fauna:** Tiger, leopard, sloth bear, wild dog, gaur, chital and sambar.
  - ⊖ **Other facts:** its landscape connects the tiger population of Maharashtra with that of Indravati in Chhattisgarh.



**Enzyme Replacement Therapy (ERT)**

- **U.S. Food and Drug Administration (USFDA) recently gave nod to world's first enzyme replacement therapy.**
  - ⊖ It approved **Adzynma, the first recombinant (genetically engineered) protein product** indicated for on-demand ERT.
  - ⊖ It will be used for treating **congenital thrombotic thrombocytopenic purpura (cTTP),** a rare blood clotting disorder.
- ERT refers to the treatment where **replacement enzymes are given to patients who suffer from conditions resulting from enzyme deficiencies or malfunction**
  - ⊖ The **replacement enzyme** derived from human, animal or plant cells is **administered directly into the bloodstream** of patient through fluids.

**Personality in News**



**Acharya Vinoba Bhave (1895-1982)**

- He was remembered on his death anniversary.
- He was a **scholar—saint** and considered one of the great **social reformers** and **spiritual heir of Mahatma Gandhi.**
- **Contributions:**
  - ⊖ **First to lead the Individual satyagraha** of Gandhiji in 1940.
  - ⊖ **Led the Bhoodan Movement** (the main initiative of the **Sarvodaya movement** in the 1950s.).
- **Achievements:**
  - ⊖ **First recipient of the Ramon Magsaysay Award** for Community Leadership in 1958.
  - ⊖ Conferred with **Bharat Ratna posthumously in 1983.**
- **Ethical Values:** Non-partisanship, compassion, Objectivity.

