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Current Affairs - 19 January 2026

INDIA'S RICE DOMINANCE COMES WITH HIDDEN COSTS

India has overtaken China to become the world's largest rice producer in 2024–25, producing about 150 million metric tonnes and accounting for nearly 28% of global output.

While this marks a sharp rise from a decade ago and reflects stagnant Chinese production, the achievement has downsides. Paddy's profitability has encouraged its spread into water-scarce regions, yields remain uneven across states, and its dominance raises concerns about water stress, crop diversification, and long-term nutritional security.

Steady Rise in India's Rice Production

- **Long-Term Growth Trend** - India's rice output has grown consistently since the Green Revolution era. Between 1969–70 and 2024–25, the area under paddy **expanded by over 36%**, yields tripled, and total production rose nearly fourfold.
- **Sharp Expansion in the Last Five Years** - The most notable surge occurred recently. Paddy area increased from 43.66 million hectares in 2019–20 to 51.42 million hectares in 2024–25, while production jumped from 118.87 to 150 million metric tonnes.
- **Growing Global Share** - As output rose, India's share of global rice production climbed from 21.95% in 2011 to about **28% in 2024**, placing it just ahead of China and far above other producers like Bangladesh and Indonesia.

Why Paddy Dominates Indian Agriculture?

- **Wide Cultivation and Scale** - Paddy is India's most widely grown crop, cultivated in over 600 districts and spread across more than 514 lakh hectares—far exceeding the area under wheat or other major crops.
- **Assured Returns Through MSP** - A key attraction is assured procurement at Minimum Support Price. Paddy offers higher net returns per hectare than crops like maize and moong, making it financially safer for farmers.
- **Weak Performance of Alternative Crops** - Stagnant or declining yields in crops such as cotton reduce their attractiveness. Compared to global averages, India's yields in some non-paddy crops remain low.



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- **Strong Export Demand** - India is the world's leading rice exporter, earning substantial foreign exchange from basmati and non-basmati rice exports to West Asia, North America, and Europe, reinforcing paddy's appeal.
 - The country exported **six million tonnes of basmati** and **14.13 million tonnes of non-basmati rice** during 2024-25, earning \$5.9 billion and \$6.5 billion respectively.
 - India exported basmati to Saudi Arabia, Iraq, Iran, Yemen, the UAE, the US, the UK, Kuwait, Oman, Qatar, Jordan and Israel during 2024-25.

Environmental and Regional Challenges of Paddy Cultivation

- Paddy is an extremely **water-intensive crop**, requiring nearly 1–3 tonnes of water to produce just one kilogram of rice.
- Its widespread cultivation has severely depleted groundwater in many regions.
- In Punjab, excessive groundwater extraction has led to serious environmental and health problems, while paddy expansion into already water-stressed states has worsened declining water tables.
- Rice productivity also varies sharply across states due to differing agro-climatic conditions.
- In 2024–25, yields ranged from 4,428 kg per hectare in **Punjab** and 3,928 kg in **Andhra Pradesh** to much lower levels in **Bihar** (2,561 kg) and **Uttar Pradesh** (2,824 kg), compared to the **national average** of 2,929 kg per hectare.

Promoting Oilseeds and Pulses

- The strategy prioritises oilseeds and pulses to reduce India's heavy dependence on edible oil imports.
 - These crops would be promoted in a phased manner, aligned with agro-climatic suitability and soil conditions, to ensure sustainable transitions for farmers.
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TACKLING CHILD TRAFFICKING IN INDIA - LEGAL FRAMEWORK AND INSTITUTIONAL RESPONSE

- Child trafficking remains a persistent and grave violation of human rights in India.
- It involves the recruitment, transportation, harbouring or receipt of children for purposes of exploitation, including forced labour, sexual exploitation, slavery, servitude, or organ removal.
- Despite extensive constitutional and statutory safeguards, trafficking networks continue to operate due to socio-economic vulnerabilities and weak enforcement outcomes.
- Official data indicate that thousands of children are rescued every year, yet convictions remain disproportionately low, exposing gaps between law, enforcement, and justice delivery.

International and Domestic Legal Definitions

- At the international level, child trafficking is defined under the **Palermo Protocol** (2000), which treats any movement or exploitation of a child for exploitative purposes as trafficking, irrespective of consent.
- This principle has been incorporated into India's domestic legal framework.
- Under the Bharatiya Nyaya Sanhita (BNS), 2023, trafficking is defined broadly to include recruitment, transportation or harbouring through coercion, deception, abuse of power, or inducement for exploitation.
- The law recognises multiple forms of exploitation, including physical, sexual, economic, and organ trafficking, ensuring a comprehensive scope.

Constitutional Protection of Children

- The Constitution of India provides a strong foundation for protecting children against exploitation.
- **Article 23** prohibits human trafficking and forced labour, while **Article 24** bans employment of children in hazardous industries.

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- Additionally, **Article 39(e) and (f)** directs the State to ensure that children are protected from abuse and are provided conditions of freedom, dignity, and healthy development.
- These constitutional principles impose a positive obligation on the State to prevent exploitation and address the structural conditions that enable trafficking.

Key Legislations Addressing Child Trafficking

- India has enacted multiple sector-specific laws to address different dimensions of child trafficking:
 - **Bharatiya Nyaya Sanhita, 2023:** Criminalises trafficking and the buying and selling of minors.
 - **Immoral Traffic (Prevention) Act, 1956:** Targets trafficking for sexual exploitation.
 - **Juvenile Justice (Care and Protection of Children) Act, 2015:** Focuses on care, rehabilitation, and reintegration of trafficked children.
 - **Protection of Children from Sexual Offences (POCSO) Act, 2012:** Provides stringent punishments for sexual offences against children, including life imprisonment and death penalty in extreme cases.
- The POCSO Act is notable for being gender-neutral and for enabling fast-track courts to ensure speedy trials.

Way Forward: Strengthening India's Anti-Trafficking Response

- A multi-dimensional strategy is required to tackle child trafficking effectively.
 - This includes improving investigation quality, strengthening rehabilitation mechanisms, enhancing digital surveillance, and ensuring faster trials.
 - Most importantly, conviction rates must improve to establish credible deterrence.
 - Equally critical is addressing root causes through social protection, education, livelihood support, and awareness programmes.
 - A strong institutional partnership between the Union and States is indispensable for disrupting trafficking networks operating across jurisdictions.
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BOARD OF PEACE FOR GAZA - TRUMP INVITES INDIA TO JOIN THE PROPOSED BOARD

- **Purpose and mandate:**
 - To supervise Gaza's transitional governance, stabilisation, and reconstruction.
 - To oversee a temporary technocratic, apolitical Palestinian administration.
 - To manage funding for redevelopment until the Palestinian Authority (PA) completes institutional reforms.
 - Trump now seeks to expand this Gaza-specific mechanism into a **global conflict-resolution template**.
- **Composition and leadership:**
 - Chaired by U.S. President Donald Trump, its members include select invited countries and global leaders (e.g., Tony Blair).
 - It will operate as an invitation-only body, not based on universal membership.
- **UN linkage:**

UNSC **Resolution 2803** authorised a Board to supervise Gaza's transition until 2027. Russia and China abstained, but the countries of the Global South voted for it.

India's Position:

- **Current status:** India has received the invitation but has not formally responded. Pakistan has also been invited.
- **India's stated principles:**
 - Consistent support for a **Two-State Solution** (Israel and Palestine coexisting).
 - India welcomed the first phase of Trump's peace plan, especially release of hostages, and enhanced humanitarian assistance to Gaza.
- **On military involvement:** The U.S. is seeking troops for a temporary International Stabilisation Force (ISF). India has clearly **ruled out participation**, as ISF is not a UN peacekeeping mission.

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Broader Global Governance Debate:

- **Challenge to the UN system:**
 - Critics argue the Board of Peace undermines UN Charter principles, sovereign equality of states, and collective decision-making.
 - It is seen as an attempt to **sidestep the UNSC** and concentrate authority in the U.S.-led executive body.
 - **Trump's multilateral skepticism:**
 - Because of the continuation of Trump's long-standing approach. **For example**, withdrawal from UNESCO, WHO; exit from over 60 international organisations.
 - Aligned with **Project 2025** (the Heritage Foundation's blueprint for Trump's second term), which called for sharp reductions in multilateral commitments and a preference for ad hoc coalitions where the US sets the agenda.
 - **From Gaza to global template:**
 - Trump aims to transform the Board into a general crisis-management club.
 - It is framed as a solution to UNSC paralysis, especially **veto politics**.
 - It risks diverting funds, legitimacy, and attention away from the UN if successful.
 - **India's options:**
 - **Calibrated engagement:** Engage diplomatically without endorsing erosion of UN authority. Maintain distinction between political oversight and military involvement.
 - **Defend UN-centric multilateralism:** Reiterate support for UNSC-authorized mechanisms. Resist normalisation of extra-UN security architectures.
 - **Strategic autonomy:** Balance ties with the U.S. while safeguarding India's principled positions. Coordinate with like-minded countries of the Global South.
 - **Push for UN reform:** Use the crisis to highlight urgency of UNSC reform, not its bypassing.
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CHIPS TO START-UP PROGRAMME



- It is an umbrella **capacity-building initiative** launched by the **Ministry of Electronics and Information Technology (MeitY)** in 2022.
- **Target:** It targets the development of **industry-ready professionals** across undergraduate, postgraduate, and doctoral levels.
- It aims to catalyse the incubation of start-ups and enable technology transfers.
- **Features of Chips to Start-up Programme:**
 - The programme seeks to provide **access to SMART lab facilities, train students, generate patents,** and support focused research publications.
 - It **supports innovation, enhances employability,** and enables academic institutions to play a more active role in India's semiconductor value chain.
 - **Programme Approach and Implementation**
 - It adopts a **comprehensive approach,** providing **students with hands-on experience** in chip design, fabrication, and testing.
 - It is achieved through **regular training sessions** in collaboration with industry partners, combined with mentorship and practical support.
 - Students gain access to **advanced chip design tools, fabrication facilities,** and testing resources, including state-of-the-art EDA software and semiconductor foundries.
 - These opportunities also include **implementing R&D projects under** the C2S Programme to develop working prototypes of **Application-Specific Integrated Circuit (ASICs), Systems-on-Chip (SoCs),** and Intellectual Property (IP) Core designs.



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BOR TIGER RESERVE



Two new safari gates at the Bor Tiger Project were inaugurated recently.

- It is located in the Wardha District of **Maharashtra**.
- It is the **smallest tiger reserve in India** by area.
- It is **centrally located among several other Bengal tiger habitats**.
 - Towards the northeast lies the Pench Tiger Reserve, towards the east is the Nagzira Navegaon Tiger Reserve, and to the southeast is the Karhandla Wildlife Sanctuary.
 - The Tadoba Andhari Tiger Reserve is located to the southeast, the Melghat Tiger Reserve stands to the west, and the Satpura Tiger Reserve lies to the northwest.

Vegetation: The area is populated by the **Dry Deciduous Forest** type.

Flora: **Teak, tendu, bamboo, tarot, and gokhru** are some of the abundant species.

Fauna:

- Apart from tigers, the reserve is home to several other mammals like **leopards, sloth bears, sambar deer, Indian bison (gaur), chital, wild boars**, and more.
- It has recorded diversity of just under **200 avian species**, with migratory waterfowl such as the tufted duck, northern shovelers, as well as the elegant fish specialist, the osprey.
- Commonly seen resident species include the Indian peafowl, black-hooded oriole, and Indian paradise flycatcher.



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WHAT IS SOFT MATTER?



Every morning, as you use either your toothpaste or shampoo, you engage with soft matter, materials that flow like liquids under force but hold their shape at rest.

- Soft matter, or soft materials, is a **sub-field of “condensed matter”**, referring to a variety of **materials that can be easily deformed or structurally altered by thermal fluctuations or nominal external stress.**
 - Soft materials **include colloids, polymers, foams, gels, liquid crystals, and many biomaterials.**
 - They exhibit many useful and appealing properties, which account for their ubiquity in everyday life, finding use in a diverse range of **applications in industry including, food, medical, automotive, construction, transportation, electronics, and manufacturing.**
 - **Everyday examples include curd, toothpaste, shampoo, soap bubbles, and living cells.**
 - One of the important characteristics of soft matter is their physical structures in the mesoscopic scale.
 - It is the properties and interactions of these structures that determine the overall behavior of the material.
 - Unlike “hard materials” such as metals, ceramics, or glass, the **building blocks** of soft matter are **held together by weak forces.**
 - **As a result, soft material properties can be markedly affected as a result of small changes in temperature, applied force, time, and environment.**
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