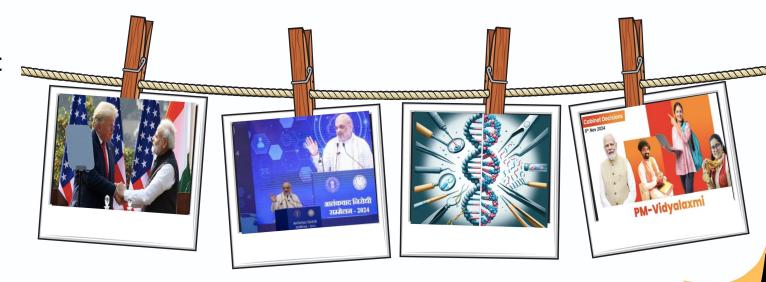
TO POTO by Dhananjay Gautam



Daily Gurrent Affairs

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You Tibe Freedom UPSC with Dhananjay Gautam













Recalling India-US relations in Trump 1.0

With Trump set to return to the White House, here is what Trump 1.0 looked like from New Delhi.







GS Paper 2 — International Relation

1. India-US Ties under Trump as US President

Context: Donald Trump's return to the U.S. presidency as its 47th President brings mixed implications for India-US relations. His first term (2017-2021) saw India and the United States enhance cooperation across multiple areas, including defence, counter-terrorism, and strategic energy partnerships, while also facing tensions in areas like trade and immigration. Trump's second term, referred to as "Trump 2.0," is anticipated to build on these foundations while presenting fresh challenges.









Trump's First Term - Strengthening Indo-US Strategic Ties:

Overview:

Under Trump's leadership, the India-US relationship moved from being merely a strategic partnership to becoming a stronger alliance, largely united on mutual defence and strategic interests. This phase saw high-level diplomatic interactions, with Prime Minister Modi's visit to the White House in 2017 and Trump's reciprocal visit to India in 2020 underscoring this evolution.









Key Areas of Cooperation:

1. Defence and Security:

- openly supported India's stance on terrorism, with specific backing for designating Jaish-e-Mohammad chief Masood Azhar as a global terrorist. The US also advocated Pakistan's greylisting by the Financial Action Task Force (FATF).
- Defence Trade and Technology: India's defence imports from the US rose significantly, with imports reaching \$18 billion, which strengthened India's military capabilities and diversified its defence procurement sources.









- 2. Energy Partnership: The 2018 Strategic Energy Partnership between India and the US helped diversify India's energy sources. The US became India's sixth-largest hydrocarbon supplier, aiding in energy security and stability.
- 3. China as a Mutual Rival: Trump's framing of China as a common strategic threat aligned with India's own security concerns. His administration revived the Quad alliance and promoted the Indo-Pacific strategy, both aimed at countering China's regional influence.









Challenges During Trump's First Term:

Despite these advances, Trump's presidency had its share of friction points with India:

- Energy Restrictions: Trump pressured India to stop oil imports from Iran, impacting India's traditional energy sources.
- **Trade Disputes**: Trump's push for lower tariffs on U.S. exports, such as Harley Davidson motorcycles, and his demands for a fairer trade balance created economic friction.
- Immigration Policies: The Trump administration's restrictions on H1-B visas affected India's IT industry, which relies heavily on skilled migration.
- . **Kashmir Mediation**: Trump's offer to mediate between India and Pakistan on Kashmir was met with backlash from India, which opposes third-party involvement on the issue.







Trump's Return and Its Potential Impact on India-US Relations:

With Trump poised to start a second term, both opportunities and potential areas of friction arise for India-US ties.

Opportunities for Stronger India-US Relations:

- 1. Reviving Trade and Defence Deals:
 - Trump has indicated a desire to resume talks on a Free Trade Agreement, potentially enhancing bilateral trade.
 - Further U.S. military hardware sales could bolster India's defence capabilities, building on the **\$18 billion** in defence imports during Trump's first term.
- **2. Energy Independence and Security:** Trump's previous support for energy independence included an MoU for the Driftwood LNG plant. Reviving such partnerships could strengthen India's energy security and reduce dependency on unstable suppliers.
- **3. Reduced Pressure on Domestic Issues:** Under Trump, diplomatic pressure over India's domestic issues like press freedoms, NGO treatment, and human rights may ease, reducing tension that arose with the Biden administration on these fronts.
- **4. Regional Policy**: Trump's firm stance on reducing funding to Pakistan is likely to continue, aligning with India's concerns regarding security in the region. Additionally, he may take a strong stance against Khalistani separatist groups.



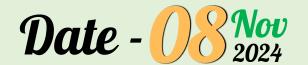




Potential Areas of Friction:

- **1. Trade and Tariff Policies**: Trump's focus on reducing trade tariffs could revive disputes over India's tariff policies, potentially creating friction in trade relations.
- **2. Diplomatic Sensitivities:** As seen during his first term, Trump's statements on sensitive topics like Kashmir and India-China conflicts could lead to diplomatic tensions. Maintaining clear communication will be essential to avoiding misunderstandings.
- **3. Sanctions on Energy Imports:** Trump's previous administration imposed pressure on India to cut oil imports from Iran and Venezuela. A similar approach during his second term could strain India's energy policies and its relationships in the region.







Conclusion: Trump's first term laid a solid foundation for Indo-US relations by enhancing cooperation in defence, counter-terrorism, and energy security. While Trump 2.0 presents opportunities to deepen this partnership, particularly through trade and defence ties, India will need to be vigilant in managing potential challenges. The evolving regional dynamics in Asia-Pacific and ongoing economic interests make it crucial for India to maintain a balanced approach in its ties with the United States under Trump's renewed presidency.













Two-day conference in Capital: Transnational organised crimes, role of social media on agenda of anti-terror meet to be chaired by Amit Shah

Sharing some of the key issues on the list, a source in the Home Ministry said it has been decided by the NIA to share the case details of Rameshwaram cafe blast — how it happened, how the accused evaded their arrest and how they were arrested owing to the coordination of West Bengal police with the NIA.

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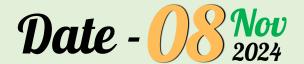
GS Paper 3 – Internal Security

2. Anti-Terror Conference 2024

Context: The Anti-Terror Conference 2024 in New Delhi, inaugurated by the Union Home Minister, brings together intelligence agencies and counterterrorism squads to address evolving threats and devise strategies to counter terrorism. The event, hosted by the National Investigation Agency (NIA), focuses on critical topics including organized crime's role in terror funding, the impact of encrypted communication tools, and the intersection of social media with terrorism.









1. Organized Crime and Terror Funding:

- Overview of Organized Crime: In India, organized crime covers drug trafficking, arms smuggling, human trafficking, extortion, and more. These activities are highly coordinated and persistently conducted to generate profits.
- Symbiosis with Terrorism: Organized crime and terrorism often support each other. Terrorist organizations fund their operations through illegal activities managed by criminal gangs, who, in turn, benefit from protection and logistical support.
- Case in Northeast India: In Manipur, Nagaland, and Assam, groups like the ULFA and NSCN have used extortion, smuggling, and illegal taxation to finance insurgent activities. Increasing use of drones for arms and drug smuggling along the India-Myanmar border has raised security concerns.





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2. Emerging Terrorist Group Formation and Criminal Linkages:

- **Preventing New Terrorist Groups**: The Union Home Minister emphasized a "ruthless" approach to prevent the rise of new terror groups. This includes tackling the financing channels that sustain these organizations, particularly in regions impacted by organized crime and cross-border smuggling.
- **Emerging Threats**: The rise of Hizb-ut-Tahrir (HuT) in southern states and transnational crime syndicates linked to terrorism are focal areas. Specific cases, such as the Rameshwaram cafe blast, underscore the significance of inter-state coordination in investigations.









3. Technological Challenges in Terrorism:

- Encrypted Apps and Social Media: Terrorist groups increasingly use encrypted applications, VPNs, and virtual numbers to evade detection. Discussions cover how these tools complicate tracking and surveillance efforts, emphasizing the need for policies to regulate social media and encrypted apps.
- **Narcotics Trafficking:** With national security implications, the NIA highlights narcotics trafficking as a substantial risk. This includes how drug profits fund terror operations and impact public safety.









4. Counter-Terrorism Coordination and Strategy:

- Unified Anti-Terror Structure: Emphasis is placed on the need for a cohesive anti-terror strategy, coordinating counter-terrorism squads with local law enforcement at district levels for faster response and intelligence sharing.
- Addressing Left-Wing Extremism: Strategies to combat terrorism in Left-Wing Extremist-affected areas are key, with a focus on disrupting financial ecosystems that support these groups.









5. National Databases for Counter-

Terrorism: The NIA utilizes a national database containing records on terrorist cases, fingerprint data, and profiles of offenders related to narcotics and human trafficking. This database supports more effective investigations by providing quick access to relevant information across law enforcement agencies.









Conclusion: The **Anti-Terror Conference 2024** aims to enhance India's counter-terrorism capabilities through a comprehensive, coordinated approach, emphasizing the regulation organized crime, advanced technology for surveillance, and a strengthened intelligence network to counter emerging threats.













Western Ghats: Expert panel to visit Goa over demand for exclusion of some villages from eco-sensitive zone

Once draft notification declaring 56,825.7 sqkm of the Western Ghats as ecologically sensitive area finalised, villages marked as ESA will see a complete ban on mining, quarrying and sand mining as well as phasing out of existing mines in five years.

Written by <u>Nikhil Ghanekar</u>
New Delhi | Updated: November 3, 2024 10:35 IST



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GS Paper 3 – Biodiversity and Conservation

3. Eco-sensitive Areas (ESA) in the Western Ghats

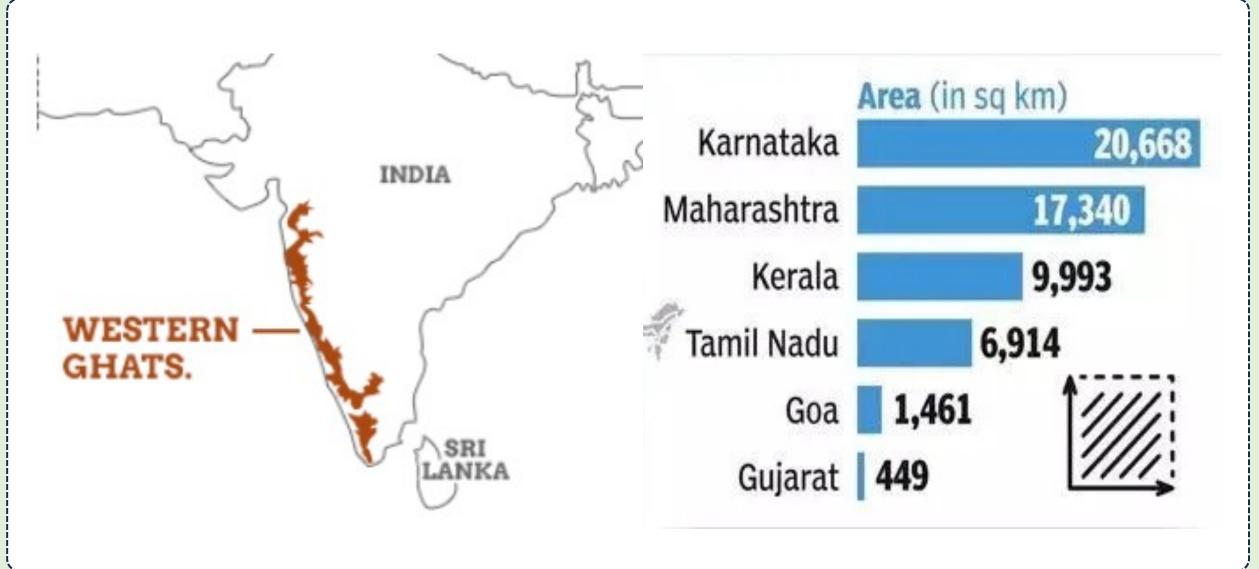
Context: The recent **sixth draft notification** from the Union Government designates around 56,825.7 square kilometers of the **Western** Ghats as an Ecologically Sensitive Area (ESA), impacting six states—Gujarat, Maharashtra, Goa, Karnataka, Kerala, and Tamil Nadu. The notification seeks to protect this unique biodiversity hotspot by restricting activities like mining, quarrying, and largescale construction in ESA zones.















Key Points about the Western Ghats ESA

Notification:

- **Objective:** The notification aims to protect the Western Ghats' rich biodiversity by limiting potentially damaging activities.
- State Feedback: States have a 60-day window to raise concerns or suggest changes regarding the villages designated as ESA.









Background on Eco- Sensitive Zones (ESZ):

- Concept of ESZ: Established in 2002, ESZs were created around protected areas to act as buffers or "shock absorbers," preserving the ecosystem around protected regions.
- **Purpose of ESAs**: Declared under the Environment (Protection) Act, 1986, ESAs are vital for conserving unique biological resources, rare species, critical habitats, and essential natural resources.





Daily Current Affairs















Need to Declare Western Ghats as an ESA:

- **Geological Sensitivity:** The Western Ghats are India's second most landslide-prone area after the Himalayas. The lack of ESA status has allowed deforestation and development to weaken soil stability, leading to environmental degradation.
- **Biodiversity**: Recognized as one of the world's eight "hottest hotspots" for biodiversity, the Western Ghats are home to a significant proportion of India's species, with many endemics like the Nilgiri tahr and lion-tailed macaque.
- . **Hydrological Importance**: Rivers originating from the Western Ghats are a primary water source for around 245 million people in peninsular India.
- **Conservation Significance:** With areas designated as UNESCO World Heritage Sites, the Western Ghats contain multiple national parks and wildlife sanctuaries, which underscore their ecological value.







States' Concerns:

- Development Restrictions: Some state governments, including Maharashtra and Goa, have requested a reduction in ESA zones, viewing the ESA designation as a barrier to development projects.
- Impact on Livelihoods: Karnataka argued that the ESA restrictions would negatively impact local livelihoods, with strong opposition from industries like mining and tourism.









Key Recommendations from Committees on the Western Ghats:

1. Gadgil Report (2011):

- . Scope: Recommended ESA status for the entire Western Ghats.
- Categorization: Proposed a three-tier system with differing conservation levels based on ecological richness and land use.
- Western Ghats Ecological Authority: Suggested creating an authority to enforce conservation.
- **Reception**: Environmentalists supported it, but states and industries opposed it for being restrictive.







2. Kasturirangan Report (2013):

- Scope: Recommended ESA status for only 37% of the Western Ghats.
- **Balanced Development**: Aimed to balance ecological sensitivity with development flexibility, focusing primarily on core sensitive areas.
- Monitoring Framework: Emphasized improving environmental clearances and setting up a monitoring agency.
- Reception: States found it more practical than the Gadgil Report, but some environmentalists considered it too lenient.







Conclusion: The Western Ghats cannot be treated purely as a wilderness zone due to their inhabited nature and cultural significance. Sustainable development that respects both ecological and human needs is essential. Policymakers must carefully balance conservation with development to create a sustainable future for this critical landscape.













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RNA editing promises to go where DNA editing can't premium

RNA editing is in its nascent stage, yet there are already at least 11 biotechnology companies worldwide developing RNA editing methods for a range of diseases

Published - November 07, 2024 05:30 am IST

MANJEERA GOWRAVARAM









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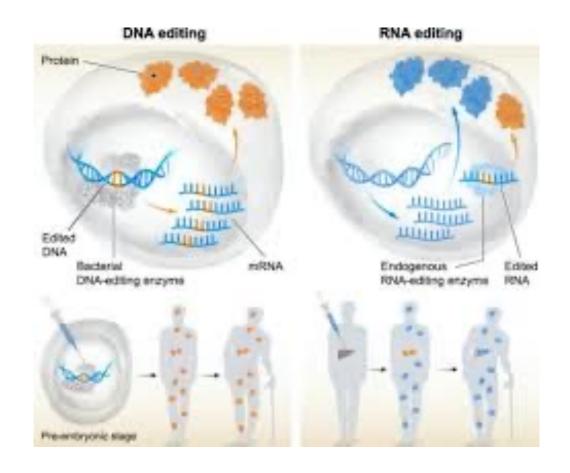




GS Paper 3 — Science and Technology

4. What is RNA Editing?

Context: The recent success of **Wave Life Sciences** in conducting the first clinical RNA editing in humans marks a significant milestone in treating genetic disorders. This pioneering work in **RNA editing** was performed on two patients with **alpha-1 antitrypsin deficiency (AATD)**, an inherited disorder that primarily affects the liver and lungs.



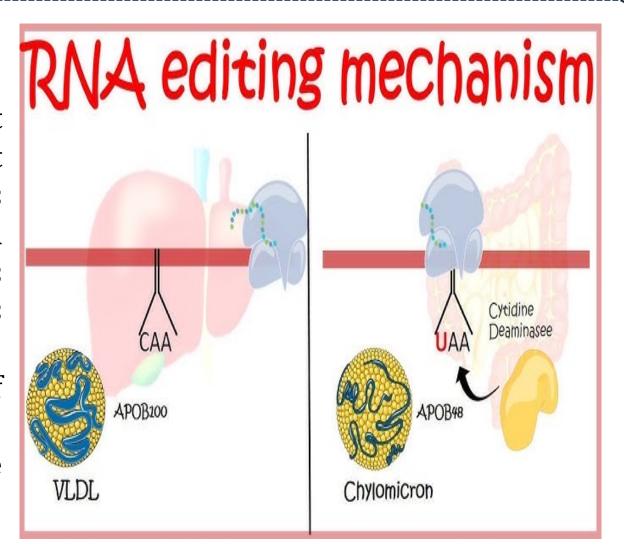






What is RNA Editing?

RNA editing allows scientists to correct errors in messenger RNA (mRNA) after it has been synthesized but before it is translated into proteins. Unlike DNA editing, which makes permanent changes to a person's genome, RNA editing offers temporary, reversible modifications. This capability prevents the production of faulty proteins that can cause diseases, providing a safer and more adaptable alternative to DNA-based gene editing.



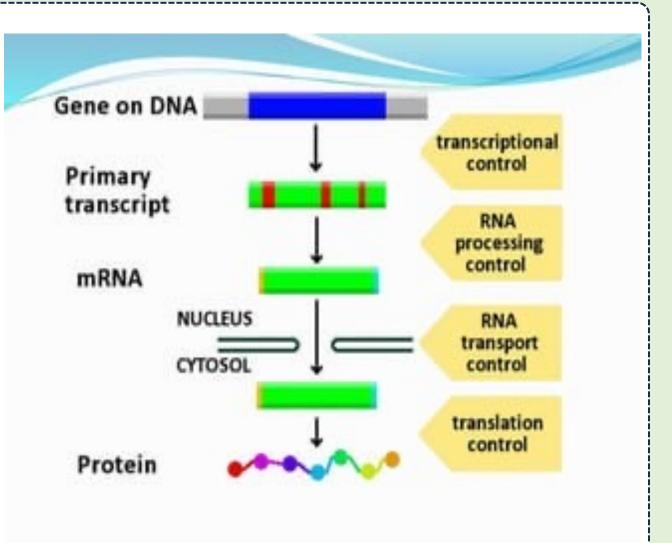






How RNA Editing Works:

The **ADAR** (Adenosine Deaminase **Acting on RNA)** enzyme plays a key role in RNA editing. ADAR alters specific mRNA sequences by changing adenosine into inosine, which mimics guanosine in the genetic code. By using guide RNA (gRNA) to direct ADAR to the specific mRNA segment that needs correction, scientists can precisely target and rectify these errors, allowing cells to produce normal proteins.

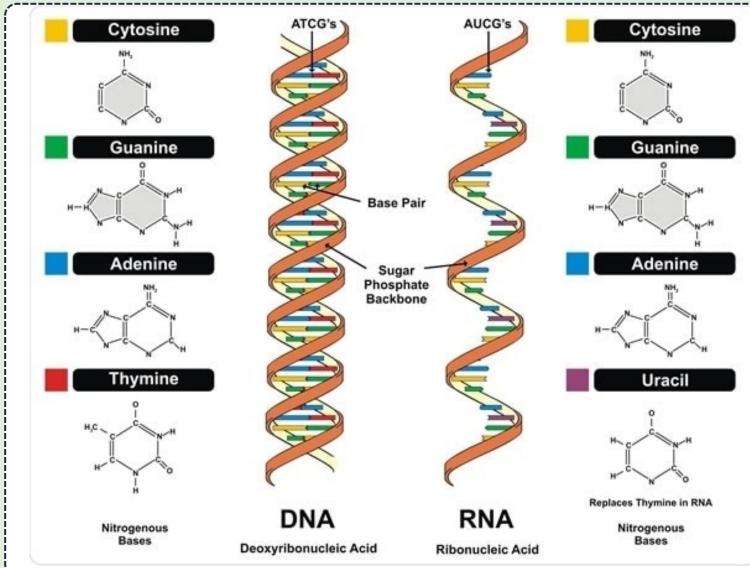




Daily Current Affairs

Date - 1 Nov 2024











The Significance of RNA Editing for AATD:

Alpha-1 antitrypsin deficiency (AATD) is an inherited disorder that can damage the liver and lungs due to the buildup of misfolded α -1 antitrypsin protein. Currently, AATD treatment is limited: patients with lung complications require weekly intravenous therapy, while those with liver damage may need liver transplants. RNA editing offers a promising therapeutic approach by potentially correcting the mRNA errors that produce dysfunctional α -1 antitrypsin, reducing the need for such invasive treatments.



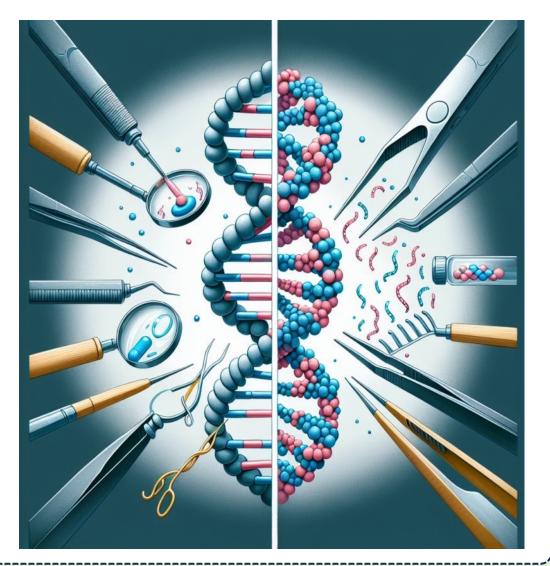






RNA vs. DNA Editing:

- 1. Safety and Flexibility: RNA editing is non-permanent, with effects that fade over time, making it a safer choice than DNA editing, which creates permanent genomic changes. DNA editing tools like CRISPR-Cas9 can introduce irreversible errors and may trigger immune reactions.
- 2. Lower Risk of Immune Reactions: RNA editing relies on naturally occurring ADAR enzymes, reducing the risk of allergic reactions compared to DNA editing tools derived from bacteria.









Challenges in RNA Editing:

- Specificity: ADAR enzymes can cause unintended changes in non-targeted regions, leading to potential side effects.
- Transient Nature: Since RNA editing effects are temporary, patients will likely need repeated treatments.
- Delivery Limitations: Current methods, such as lipid nanoparticles, have limited capacity, restricting the delivery of larger molecules required for RNA editing.









Future Prospects:

Although still in its early stages, RNA editing holds enormous potential to become a core component of gene therapy. As research and clinical trials progress, RNA editing is poised to transform the gene-editing landscape, especially for treating genetic disorders where precision and reversibility are crucial.









Cabinet



Cabinet approves PM-Vidyalaxmi scheme to provide financial support to meritorious students so that financial constraints do not prevent any youth of India from pursuing quality higher education

A mission mode mechanism will facilitate and drive the extension of education loans to meritorious students who get admission in the top 860 quality higher educational institutions of the nation, translating to covering more than 22 lakh students every year

A special loan product will enable for collateral free, guarantor free education loans; made accessible through a simple, transparent, student-friendly and entirely digital application process

Loan amounts up to ₹ 7.5 lakhs will be provided a 75% credit guarantee by the Government of India, to support banks to expand coverage

Furthermore, for students with up to Rs. 8 lakhs annual family income, the scheme will also provide for 3% interest subvention on loans up to Rs 10 lakh





GS Paper 2 – Government Policies

5. PM-Vidyalaxmi Scheme

Context: The PM-Vidyalaxmi Scheme has been launched by the Union Cabinet to support meritorious students in India pursuing higher education. This Central Sector Scheme provides accessible financial aid to students aiming to study at top institutions, enabling them to secure education loans easily and affordably.



PM-Vidyalaxmi







Key Features of the PM-Vidyalaxmi Scheme:

- 1. Collateral-Free Loans: Students admitted to Quality Higher Education Institutions (QHEIs) will be eligible for collateral-free, guarantor-free loans to cover full tuition and related expenses. This funding will be available through banks and financial institutions.
- 2. Digital, Student-Friendly System: The scheme will operate through a simple, transparent, digital, and interoperable platform for students to apply for loans easily. The unified portal, "PM-Vidyalaxmi," will enable students to apply for both loans and interest subvention.





Daily Current Affairs

Date - 18 Nov 2024





PM-Vidyalaxmi

Collateral-free, Guarantor-free Education Loans

Maximising access to quality Higher Education for Yuva Shakti



Total outlay ₹ 3600 Crore



Financial assistance to meritorious students securing admission in top **860 HEIs of India**



Benefitting 22 Lakh+ new students every year

(a) (b) (b) dpradhanbjp / (f) Dharmendra Pradhan Odisha / Dharmendra Pradhan BJP



PM-Vidyalaxmi

Collateral-free, Guarantor-free Education Loans

Maximising access to quality Higher Education for Yuva Shakti



Students having annual family income of upto ₹8 lakh shall be eligible to get 3% interest subvention on loans upto ₹10 lakh.



Loans upto ₹7.5 lakhs shall be eligible for 75% credit guarantee.



Education loans will be facilitated through a **transparent**, **student-friendly** and **digital application process** common to all banks.



PM Vidyalaxmi is another concrete step towards implementation of **NEP**.

(a) Dharmendra Pradhan Odisha / Dharmendra Pradhan BJP







Eligibility Based on NIRF Rankings:

- Applicable to all **Higher Educational Institutions (HEIs)** ranked in the top 100 in the National Institutional Ranking Framework (NIRF) in overall, category-specific, and domain-specific rankings.
- Also includes state government HEIs ranked within 101-200 in NIRF and all central government institutions.
- The list of eligible institutions will be updated annually with the latest NIRF rankings.









Loan Provisions:

- For loans up to ₹7.5 lakhs, students receive a credit guarantee of 75% on outstanding defaults, which encourages banks to lend under the scheme.
- of up to ₹8 lakhs who don't qualify for other government scholarships or interest subvention schemes will receive a 3% interest subvention on loans up to ₹10 lakhs during the moratorium period (usually the study period plus some months post-study).









Interest Subvention for 1 Lakh Students Annually:

The scheme will support 1 lakh students each year, focusing on those from government institutions enrolled in technical or professional courses.

The interest subvention payments will be processed via E-vouchers and Central Bank Digital Currency (CBDC) wallets for seamless transactions.





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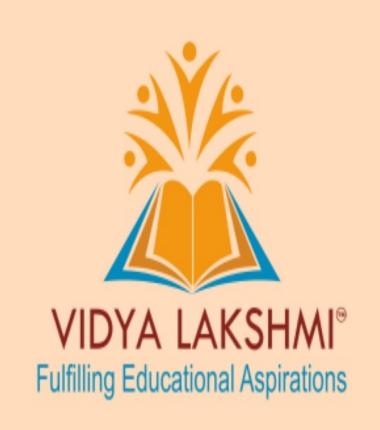




Financial Outlay: An allocation of **₹3,600 crore** has been made for the scheme, covering the period from **2024-25 to 2030-31**.

PM-Vidyalaxmi Portal:

The **Department of Higher Education** will maintain a centralized "PM-Vidyalaxmi" portal, offering a **simplified application process** for all participating banks, where students can apply for loans and interest subvention.









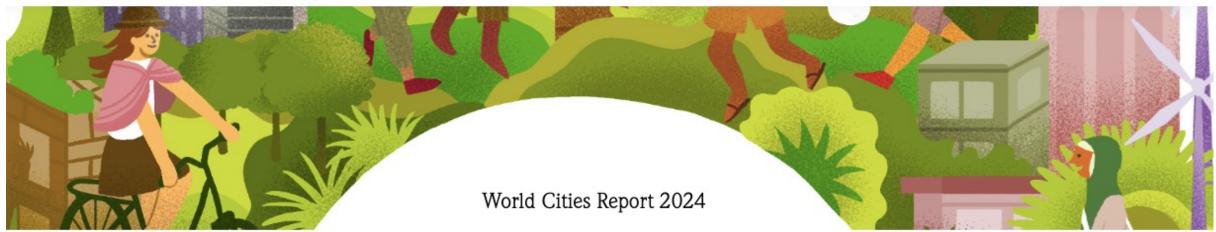












Cities and Climate Action

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GS Paper 3 – Economic Development

6. World Cities Report 2024

Context: The **UN-Habitat's** "World Cities Report 2024: Cities and Climate Action" highlights the dual role of cities as both victims of climate change and major contributors to greenhouse gas emissions, though they are disproportionately affected by climate-related impacts. The report emphasizes the urgent need for cities to adopt climate-resilient strategies and tackle the gap in funding for climate action.









Key Findings:

- **1. Exposure to Climate Change:** Over **2 billion people** living in cities are projected to face an additional **temperature increase of at least 0.5°C by 2040**, exacerbating the impacts of climate change on urban areas.
- **2. Funding Gap:** Cities require an estimated **\$4.5-5.4 trillion annually** to develop and maintain climate-resilient systems. However, current funding stands at only **\$831 billion**, underscoring a significant shortfall in climate investment.
- **3. Shrinking Green Spaces:** The proportion of **urban green space** has dropped globally, with the average share falling from **20% in 1990 to 14% in 2020**. This decline is detrimental to the environmental and social quality of cities.
- **4. Impact on Vulnerable Communities**: Some climate interventions, while well-meaning, have had unintended negative consequences, such as **"green gentrification"**, where the creation of parks and green spaces drives up property values and displaces low-income households.



To the Point Daily Current Affairs













Recommendations:

- 1. Revenue Generation and Climate Finance: Cities should raise revenue through debt, Public-Private Partnerships (PPPs), and innovative financial instruments to mobilize climate finance and bridge the funding gap.
- 2. Integrating Climate Action into Urban Planning: Climate action must be integrated into urban planning processes, prioritizing locally-led climate adaptation efforts to build resilience and sustainability.
- **3. Strengthening Social Protection**: Strengthening **social protection programs** and **adopting nature-based solutions** (such as green infrastructure) can help mitigate the effects of climate shocks and improve overall urban resilience.









United Nations Human Settlements Programme







Conclusion: The **World Cities Report 2024** underscores the urgency for cities to integrate climate action into urban planning, adopt sustainable financial models, and prioritize social equity to ensure a resilient and sustainable urban future.













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