ECI signed MoU with Indian Banks' Association (IBA) and Department of Posts (DoP) to enhance voter outreach

- This is in continuation of the Election Commission of India's (ECI) efforts **to enhance electoral awareness.**

- Recently**, ECI** also signed an **MoU with the Ministry of Education** to **integrate electoral literacy into the educational curriculum.**

- **Systematic Voters' Education and Electoral Participation (SVEEP):** Flagship program of the ECI for voter education, spreading voter awareness, and promoting voter literacy in India.

- **Need for Voter Education in India**
  - **Voter's Right:** SC in **People's Union for Civil Liberties v. UoI, (2003),** held that voters have a **right under Article 19(1)(a)** to obtain information about candidates contesting elections.
  - **Insufficient turnout:** Around 30 crore electors (out of 91 crore), did not cast their votes in the General Election to Lok Sabha 2019.
  - **Inclusive democracy:** Critical in **enhancing participation of women, youth, divyangs, marginalized sections,** etc. in elections.
  - **Informed and ethical voting:** Necessitated due to prevalence of misinformation,divisive propaganda, fake news, etc.

- **Steps required by ECI to promote voter education**
  - **Promoting Critical thinking among voters** to move beyond voter turnout to uplift the quality of votes casted.
  - Encouraging cooperation with **Civil Society Organisations(CSO).** E.g CSOs can help voters inculcate practices of fact-checking.

Ensure women are granted permanent commission(PC) in the Indian Coast Guard: Supreme Court to centre

- PC means a **career in the defence forces till retirement.**
- **Importance of Women in Defence Forces**
  - **Gender Equality and Inclusion:** It upholds the values of equality and allows equal, non-discriminatory opportunities at work in line with Article 14,15,16.
  - **Talent Pool and Recruitment:** Women in the age of cyber warfare and digitally equipped weapons can handle weapons efficiently.
  - **Role Models and Mentorship:** Women can inspire young girls to pursue careers in traditionally male-dominated fields.
  - **Humanitarian and Peacekeeping Missions:** Women can connect local populations, especially in societies where cultural norms may limit interactions with male soldiers.
- **Challenges:** Gender Stereotypes and Bias, Physical Standards, Discrimination and Harassment, etc.
- **Background of Women in Defence Force**
  - In 1888, the role of women in the Indian army began in "**Indian Military Nursing Service**"
  - **Army Act, 1950 prohibited the recruitment of females** into the army.
  - In 1992, the Army, Air Force and Navy began **inducted women as Short Service Commission (SSC)** officers outside medical services.
  - In 2020, the Supreme Court passed landmark judgment **(The Secretary, Ministry of Defence V. Babita Puniya & Ors.)** to grant PC to women.

Indian Coast Guard — **New Delhi**

Genesis: Established in 1977

Ministry: Works as per the Coast Guard Act 1978, under the Ministry of Defence.

Mandate: Safety and protection of artificial Islands and offshore terminals
- Assistance to Fishermen in distress
- Preservation and protection of the marine environment
- Assisting the Customs in anti-smuggling operations, safeguarding Exclusive Economic Zone (EEZ) etc.

13th Ministerial Conference (MC13) of the World Trade Organization (WTO) began in Abu Dhabi

- MC is the **topmost decision-making body of the WTO** and usually meets **every two years.**
  - It brings together **all members (countries or customs unions) of the WTO.**
  - It can decide on any **matters under any of the multilateral trade agreements.**
- **Key highlights of MC 13**
  - **Comoros and Timor Leste acceded** to WTO.
  - **India has opposed mixing non-trade topics** (e.g. Gender, MSMEs) **with WTO rules** as it can lead to **greater trade fragmentation.**
    - Additionally, such non-trade topics are already **under discussion in other relevant international organizations.**
  - India also **expressed serious concerns** regarding **increasing use of trade protectionist unilateral measures** sought to be justified in the **guise of environmental protection.**
- **Other concerns of India associated with the WTO**

Issues	India's stand

Plurilateral agreements	◗ **India opposed** China-led **Investment Facilitation for Development Agreement (IFDA)** proposal as:
	  ⊕ **investment falls outside the mandate of WTO,**
	  ⊕ India is **against plurilateral pacts on multilateral platforms.**

Public stockholding (PSH) programme	◗ India wants a permanent solution for the **PSH programme.** ⊕ At present, developing countries' food subsidies are protected by the **Bali peace clause** (negotiated as a temporary solution).
Moratorium on customs duty on e-commerce	◗ Since 1998, WTO countries have agreed to **not impose customs duties on electronic transmissions** covering both goods (such as e-books and music downloads) and services. ◗ India **opposes extension of this moratorium** as it benefits developed countries at the cost of developing countries.

First private sector facility for the manufacture of ammunition and missiles opened in Kanpur(UP)

- It is opened in the **Defence Industrial Corridor (DIC) of UP.**
  - The other **defence corridor is in Tamil Nadu.**
- The Defence Industry sector was opened up to **100% for Indian private sector participation in 2001.**
- **Need for privatisation of the Defence sector:**
  - India is **third largest military spender(after US and China) and the world's largest arms importer,** Stockholm International Peace Research Institute (SIPRI) Report.
  - The share of the **defence budget can be reduced which stands at 13.04% of the total government expenditure.**
  - **Surplus production** will boost defence exports and would help to achieve the set target of 35000 crore of exports by 2024-25.
- **Concerns:** security concerns like **protection of sensitive data at the hands of private companies; selling weapons to customers** who are not aligned with India's national interest; etc.
- **Government steps for promotion of indigenous Defence Production:**
  - Priority to the **procurement of capital items** from **domestic sources** under **Defence Acquisition Procedure (DAP)-2020.**
  - **Liberalization of Foreign Direct Investment(FDI) policy** by allowing **74% FDI under automatic route.**
  - The launch of **the Innovations for Defence Excellence (iDEX) scheme.**
  - **The SRIJAN portal** to **facilitate indigenisation by Indian Industry** including MSMEs.

Related News: **SAMAR (System for Advance Manufacturing Assessment and Rating) certification**

- **The Defence Research and Development Organisation (DRDO)** handed over **SAMAR assessment certificates** to nine Industry Partners.
- **About SAMAR**
  - It is **a benchmark to measure the competency of defence manufacturing enterprises.**
  - It is based on **a maturity assessment model** developed by **the Quality Council of India (QCI)**
  - **Applicability: to all defence manufacturing enterprises.**
  - **Validity:** 2 years.
  - It's an outcome of the **collaboration between DRDO and QCI.**

SECI Commissioned India's largest Battery Energy Storage System (BESS) in Rajnandgaon, Chhattisgarh

- SECI's **40 MW/120 MWh BESS** will **store solar energy** when the sun is shining and using it later during hours of peak demand in the evening.
  - It is funded by the **World Bank** and **Clean Technology Fund (CTF)** under Innovation in Solar Power & Hybrid Technologies (ISP&HT) Project.
- **About BESS**
  - A **BESS** is an **electrochemical device** that **charges** (or collects energy) from the grid or a power plant and then **discharges** that energy at a later time to provide **electricity or other grid services when needed.**
  - It is helpful in:
    - Improving **grid stability** enabling larger Renewable Energy (RE) integration
    - Bringing down peak deficits
    - Meeting **Renewable Purchase Obligations (mandates discoms to purchases a minimum percentage of electricity** from RE).
    - **Reduction of carbon emissions**
  - **Initiatives to promote BESS**
    - Allowing BESS to participate in the **High Price Day Ahead Market (HP-DAM) segment** of the Energy Exchange.
    - **Viability Gap Funding (VGF) scheme** for development of 4,000 MWh of BESS projects by 2030-31
    - **Waiver of Inter-State Transmission Charges** on BESS Projects commissioned up to July 2025.
    - **National programme on Advanced Chemistry Cell (ACC) battery storage** for Gigascale.
    - **Bidding Guidelines** for BESS.

> - **Clean Technology Fund (CTF)**
>   - **Proposed in 2008.**
>   - Seeks to promote **scaled-up financing** for demonstration, deployment and transfer of **low-carbon technologies** with significant **potential for long-term greenhouse gas emissions savings.**
>   - Funds projects in **developing countries.**
>   - **World Bank acts as Trustee** for the CTF.
> - **ISP&HT**
>   - It seeks to demonstrate the **operational and economic feasibility** of utility scale innovative renewable energy technologies and **BESS.**

BharatGPT group led by IIT Bombay to launch 'Hanooman' a ChatGPT-like service

- Hanooman is a series of **large language models (LLMs)** that can respond in **various Indian languages like Hindi, Tamil, and Marathi.**
  - It is expected to work in four fields, including **health care, governance, financial services, and education.**
- LLMs are **deep learning models that consume and train on massive datasets** to excel in **language processing** tasks.
  - They create new combinations of text that **mimic natural language** based on its training data.
  - The training data is usually large datasets **including Wikipedia and OpenWebText.**
- **Applications of LLM**
  - **Medical:** For tasks like **protein structure prediction** that can uncover patterns in disease and predict outcomes.
  - **Retail:** To provide **enhanced customer experiences** through **dynamic chatbots.**
  - **Software:** To **write software** and **teach robots** how to do physical tasks.
  - **Finance:** To **summarize earnings calls** and create transcripts of important meetings.
  - **Marketing:** To organize customer feedback.
- **Challenges in developing LLM:** Significant capital investment, large datasets, technical expertise, and large-scale computing infrastructure necessary to develop and maintain LLMs.
  - **S**ourcing of quality datasets** in Indian languages is a major hurdle in developing LLM in Indian languages.

> **Generative Pretrained Transformer (GPT) vs LLM**
> - **A GPT is a type of LLM** that uses deep learning to generate human-like text.
> - **They are called**
>   - "**generative**" because they can **generate new text** based on the input they receive,
>   - "**pretrained**" because they are **trained on a large corpus of text data** before being fine-tuned for specific tasks, and
>   - "**transformers**" because they **use a transformer based neural network** architecture to process input text and generate output text.

Also in News

📄 Base Erosion and Profit Shifting (BEPS)

- Mauritius Government has decided to **amend the Double Taxation Avoidance Agreement (DTAA) with India** to comply with the BEPS minimum standards of the OECD.
  - **DTAA** is a tax treaty signed between two countries for the elimination of double taxation.
- **BEPS refers to tax planning** used by **multinational enterprises** that exploit gaps and mismatches in tax rules **to avoid paying tax.**
  - **OECD/G20 Inclusive Framework on BEPS** provides **15 Actions** that equip governments with the **domestic and international instruments** needed to tackle tax avoidance.

📊 Investor Information and Analytics Platform(IIAP)

- Union Minister of State for Electronics and IT launched IIAP developed by IIT Madras.
- **About IIAP:**
  - It will act as a **one-stop shop for startups** to seamlessly access Venture Capitalists (VCs) and investor networks, Govt schemes, etc.
  - **Entrepreneurs can search for information on government agencies, incubators, investors, VCs, etc.**
  - An important feature of the platform is **"StartupGPT" which is an AI-based conversational platform.**
    - **It will ease information access for those who are navigating exhaustive data.**

Political parties and Income tax

- Recently **Income-Tax department** has raised a **demand of ₹210 crore in penalty** from a national level political party for **discrepancy** and **delay in filing the returns.**
- **Section 13A of the IT Act, 1961, exempts political parties** (registered by Election Commission under Representation of the People Act, 1951) from paying income tax.
  - For exemption parties must fulfil, **some conditions** including maintaining books of account and other documents, their accounts are audited as per the law, etc.
- However, **under Section 139 (4B) of the IT Act,** Political parties are **required to file their Income tax returns** if:
  - Their **total income** (before exemptions under Section 13A) is **higher than the tax exemption threshold.**

Garbhini-GA2

- Translational Health Science and Technology Institute (THSTI) and IIT Madras researchers have developed:
  - **India-specific model** to determine the age of a foetus in a pregnant woman in the **second and third trimesters precisely** known as Garbhini-GA2.
- **Garbhini-GA2** is a part of the Interdisciplinary Group for Advanced Research on Birth Outcomes –Department of Biotechnology (DBT) India Initiative (GARBH-Ini) program.
- **About (GARBH-Ini) program**
  - It is a **cohort study of pregnant women** initiated in 2015.
  - **Objectives:** to identify clinical, epidemiologic, genomic, and generate a risk-prediction algorithm for preterm birth.

Chromosomal disorder in ancient individuals

- Researchers have reported **Down syndrome** and **Edwards syndrome** from prehistoric skeletal remains, dating up to **approximately 5,500 years old.**
- Both are **trisomy disorders** wherein individuals have an **extra copy of the chromosome.**
  - **Edwards syndrome:** An extra copy of chromosome 18 is present in the individual.
    - Most babies with Edwards' syndrome **will die before or shortly after being born.**
  - **Down syndrome:** An extra copy of one of chromosome 21 is present.
    - Kids with down syndrome usually have an IQ in the **mildly-to-moderately low range** and are **slower to speak than other children.**

2024 Amendment to IT Rules, 2009

- Exercising power under the **Information Technology (IT) Act (2000),** the Central Government Amended the **IT (Procedure and Safeguards for Interception, Monitoring and Decryption of Information) Rules, 2009.**
  - Its Rule 23 mandated **every record,** including electronic records of **interception, monitoring or decryption** of information to **be destroyed every six months** except in a case where such information is required, or likely to be required.
    - So far, only **security agencies** had such power of destruction.
    - The 2024 Amendment also bestows this power to **"competent authority** (i.e., Union Home Secretary or Secretary in charge of Home Deptt. for States/UTs) **in addition to the security agency".**

Homosep Atom

- **India's first septic tank/manhole cleaning robot** known as Homosep atom developed by the startup Solinas reached 16 cities.
  - Solinas was incubated in the **Department of Science and Technology (DST)-Technology Business Incubator (TBI)** of IIT Madras.
- **About Homosep Atom**
  - Robotic solution **integrated with Artificial Intelligence (AI)** to inspect, clean, and manage confined space for sanitation purposes.
  - **Features:** Extensive blade cleanings, solid waste desilting, suction, and storage at one device.
  - Offers end-to-end **solutions to eliminate manual scavenging.**

Operation AMRITH (Antimicrobial Resistance Intervention for Total Health)

- Kerala initiated Operation AMRITH, a program enforcing H1 rule, mandating a doctor's prescription for acquiring any class of antibiotics.
- **About H1 rule:** The Drugs and Cosmetic Rule, 1945 was amended in 2013 to incorporate a new Schedule H1.
- **The Drugs falling under Schedule H1 are required to be sold in the country with the following conditions:-**
  - The supply of a **drug shall be recorded in a separate register.**
  - They shall be **labeled with the symbol Rx** which shall be in red and conspicuously displayed on the left top corner of the label.

Places in News — Hungary (Capital: Budapest)

- Hungary's parliament approved Sweden's NATO accession.
- **Political Features**
  - **Landlocked country** in central Europe.
  - Shares border with **Slovakia, Ukraine, Romania, Serbia, Croatia, Slovenia,** and **Austria.**
- **Geographical features**
  - Relief is **dominated by great lowland expanses including Little Alfold** (Little Hungarian Plain) in Northwest and **Great Alfold** from southwest to northeast
  - **Highest Peak:** Mount Kékes
  - **Major Rivers:** Danube, Tisza, etc.
  - **Lakes:** Lake Balaton, Neusiedler Lake etc.
  - **Climate:** Moderately dry continental climate

AHMEDABAD BENGALURU BHOPAL CHANDIGARH DELHI GUWAHATI HYDERABAD JAIPUR JODHPUR LUCKNOW PRAYAGRAJ PUNE RANCHI