

1. **Ram Manohar Lohia:** On March 23, the 115th birth anniversary of Ram Manohar Lohia, Indian Prime Minister remembered him as a “visionary leader, fierce freedom fighter, and an icon of social justice.”
- **About:** Ram Manohar Lohia born in Akbarpur, Uttar Pradesh
 - **Socialist Ideology:** Lohia classified Gandhians into three types - Priestly, Governmental, and Heretic (Socialist Party's ideology).
 - **Lohia's Sapta Kranti (Seven Revolutions):** Gender equality → Political, economic, race-based equality → Caste destruction → Opposition to foreign domination → Economic equality, planned production → opposition to private property → Protection of individual freedoms → Opposition to arms and weapons, promotion of satyagraha.
 - Lohia laid the ideological groundwork for OBC empowerment, influencing the Mandal movement in Northern India.
 - **Social Justice:** Advocated a comprehensive policy of preferential opportunities for OBCs, Dalits, Adivasis, and women.
 - His slogan “**Pichhada Pave Sau Me Saath**” called for **60% reservation** for backward classes, seeing **gender injustice** as the **primary injustice**.
 - Supported intersectional approaches to social justice, addressing caste, class, and gender inequalities.
 - **Language Policy:** Lohia opposed the hegemony of English, not due to its foreign origin but because it represented feudalism and class inequalities.
 - **Philosophical Legacy:** Critiqued Eurocentric Western theories while rejecting romantic nativism.
 - Promoted a vision of decolonisation, social and economic egalitarianism, and offered the blueprint for a new form of radicalism.
2. **United Nations Environment Programme's Food Waste Index Report (FWIR) 2024:** In 2022, the world wasted 1.05 billion tonnes of food — nearly 20% of all food available to consumers, as per the FWIR report.
- **Key highlights of the report:** India ranks among the top contributors to this global issue, demanding immediate attention due to its moral and environmental implications.

- **Food Wastage vs Food Loss:**

- **Food Wastage:** Includes edible and inedible parts discarded from the food supply chain, from manufacturing and retail to restaurants and households.
- **Food Loss:** Occurs earlier in the supply chain due to poor storage, transport, and handling.

- **India's Position:** Second-highest food-wasting nation after China.

- **Per capita household food waste in India:** 55 kilograms annually (lower than the U.S. — 73 kg), but large population leads to immense total waste.

- India discards about **78 million tonnes of food annually**, while over **20 crore Indians go to bed hungry**.

- **Environmental Impact:**

- **Resource-intensive production:** Wasting food means wasting land, water, and energy.
- Contributes 10%-12% of total municipal waste in India, leading to methane emissions from landfills.
- **Global emissions:** Food loss and waste generate 8%-10% of annual greenhouse gas emissions.
- If food waste were a country, it would be the third-largest emitter after China and the U.S.

- **Social Injustice:** Wastage prevents food from reaching the needy, hindering progress toward SDG 2 (Zero Hunger) and SDG 12.3 (Reduce Food Waste).

- **Initiatives:** India's **"Save Food Share Food" programme** shows the potential of large-scale redistribution efforts.

- 3. **DNA Fingerprinting:** DNA fingerprints can establish parent/child relationships, help identify individuals from mortal remains at disaster sites, and exonerate wrongly accused convicts.

- Similar to Aadhaar for social security, DNA fingerprints uniquely identify individuals for biological purposes.
- **About DNA:** Each cell contains 46 DNA molecules — 23 from the father via sperm and 23 from the mother via the egg.
 - Sperm and egg cells have only one copy of the genome each, unlike other cells.
 - **Chromosomes:** DNA is packed inside chromosomes (e.g., chromosome no. 3 contains 6.5% of total DNA).

- **Polymorphisms:** Differences in DNA, called polymorphisms, help differentiate individuals and trace ancestry.
- **STRs (Short Tandem Repeats):** Repeated sequences of base-pairs in DNA, e.g., GATC-GATC-GATC. They are often polymorphic, making them ideal for DNA profiling.
- **Applications of DNA Fingerprinting:**
 - **Identification:** Used to identify individuals from teeth, bones, blood, spit, semen, skin etc.
 - **Forensics:** Identifies suspects from crime scene materials (blood stains, sweat, spit, etc.).
 - **Ancestry and Parentage:** Establishes parent/child relationships and traces ancestry.
 - **Cold Cases:** Solves old cases by re-analyzing DNA from archived crime scene materials.
 - **Exoneration:** Has helped exonerate wrongly accused convicts.
 - **Organ Donation:** Identifies/excludes potential donors.
 - **Stability:** DNA is highly stable — recovered from 65,000-year-old human remains.
- 4. **Solar Cities in Uttar Pradesh:** In the National Conference under the National Clean Air Programme (NCAP) in Gorakhpur, the Uttar Pradesh government decided to develop all 17 municipal corporations of the state as solar cities.
 - **About Solar Cities:** Promotes the use of **renewable energy** for achieving **energy self-sufficiency** and **environmental protection**.
 - **Implementation of schemes like:** Solar power plants, Solar street lights, and solar water-heating systems, supports the 'net-zero' target set by PM Modi for the year 2070.
 - **The 17 Municipal Corporations in Uttar Pradesh include:** Kanpur, Lucknow, Ghaziabad, Agra, Varanasi, Prayagraj, Meerut, Bareilly, Aligarh, Moradabad, Saharanpur, Gorakhpur, Firozabad, Mathura, Ayodhya, Jhansi, and Shahjahanpur.
 - **Solar City:** It is a city that meets its energy needs primarily from **solar energy**.
 - **Objective:** Maximize the use of **renewable energy sources** and reduce **carbon emissions**.
 - **About National Clean Air Programme (NCAP):** Aims to systematically address **air pollution** by involving all stakeholders and ensuring necessary actions.
 - **131 cities** identified for implementing city-specific action plans.
 - **Objective:** First national-level effort to develop a framework for **air quality management** with a focus on **time-bound pollution reduction**.

- Targets to reduce **PM10** and **PM2.5** concentrations by at least **20%** over **five years** (base year: **2017**).
 - **Monitoring:** The PRANA portal (launched by MoEFCC) monitors - Implementation of NCAP → Progress on city-specific action plans → Sharing of best practices across cities.
- 5. Exercise AIKEYME:** The Indian Navy has announced maiden initiatives to enhance cooperation with Africa and the Indian Ocean Region (IOR), including the large-scale multinational exercise 'Africa India Key Maritime Engagement (AIKEYME)' and the deployment of Indian Ocean Ship (IOS) Sagar.
- **About Exercise AIKEYME:** India's first-ever multilateral naval exercise with 10 African nations.
 - **Objective:** Improve maritime cooperation and enhance maritime security and address regional threats like piracy and drug trafficking.
 - **Participating Countries:** Tanzania (co-host), Comoros, Djibouti, Eritrea, Kenya, Madagascar, Mauritius, Mozambique, Seychelles, and South Africa.
 - **Focus:** Increase interoperability between the Indian Navy and African navies.
 - **IOS Sagar Initiative:** Deepen maritime cooperation with IOR (Indian Ocean Region) countries.
 - **Deployment:** Involves the deployment of **INS Sunayna** with a **combined crew** of **Indian sailors** and **44 personnel** from **nine African countries**.
 - **Key Participating Countries:** Sri Lanka, Maldives, Mauritius, Comoros, Kenya, Madagascar, Mozambique, Seychelles, and South Africa.
- 6. Zaid Crops:** Recently, the Uttar Pradesh government has included 9 zaid crops under the Kisan Credit Card (KCC) and Pradhan Mantri Fasal Bima Yojana (PMFBY).
- **About Zaid Crops:** It grown between the **Rabi and Kharif seasons**, have a high tolerance for intense heat and dry winds.
 - Major zaid crops include cucumber, pumpkin, bitter gourd, watermelon, sugarcane, and peanut. In North India, usually sown in March-April.
 - Farmers will now benefit from KCC and crop insurance for crops like groundnut, maize, green gram, urad, papaya, litchi, watermelon, melon, and amla.
 - Provides easy access to agricultural loans and compensation for crop loss due to natural calamities.

- **Kisan Credit Card (KCC):** It was launched in 1998 to provide timely and adequate credit to farmers for **agricultural and ancillary expenses**.
 - **Benefits:** Offers loans at **low interest rates** and farmers who **repay on time** get an **interest discount of up to 3%**.
 - **Implementing Agencies:** Commercial Banks → Regional Rural Banks (RRBs) → Small Finance Banks → Co-operative Societies
- **About Pradhan Mantri Fasal Bima Yojana (PMFBY):** Launched in 2016 under the Ministry of Agriculture and Farmers Welfare.
 - **Eligibility:** All farmers, including **tenant farmers/holding farmers** growing **notified crops** in **notified areas**.

7. UNESCO's World Water Development Report (WWDR): Glaciers around the globe are disappearing faster than ever, with the last three years recording the largest glacial mass loss on record, according to a UNESCO report.

- **Key Highlights of the report:**
 - **Theme:** Mountains and glaciers – Water towers.
 - **Ice Loss:** 9,000 gigatonnes of ice lost since 1975, equal to an ice block the size of Germany with a thickness of 25 metres.
 - **Major Contributors:** Mountain glaciers are among the largest contributors to sea level rise.
 - **Sea Level Rise:** Between 2000 and 2023, glacier melt caused 18 mm of global sea level rise (~1 mm/year), exposing 300,000 people annually to flooding.
 - **Glacial Disappearance:** Rwenzori Mountains' glaciers (Uganda and DRC) expected to vanish by 2030.
- **About Pastoruri Glacier (Peruvian Andes, Peru):** One of the glaciers facing rapid melting due to global warming, located in the Peruvian Andes.
- **About UNESCO's World Water Development Report (WWDR):** UN-Water's flagship report on water and sanitation issues.
 - **Launch:** Released on World Water Day (March 22), with a different theme each year.
 - **Publisher:** Published by UNESCO on behalf of UN-Water; coordinated by the UNESCO World Water Assessment Programme.