

Soya Meal as an Essential Commodity

Agricultural Pricing - GS Paper - 3 , Food Security



Why in News

Recently, the government has notified, under the **Essential Commodities Act 1955**, to declare '**soya meal**' as an **essential commodity** up to 30th June, 2022.

- This step is **expected to stop any unfair practises** (like **hoarding, black marketing** etc) in the market having the **potential to hike the prices of soya meal**.

- This will also enhance the **availability of the commodity for consumers** like poultry farms and cattle feed manufacturers.

Key Points

- **About Soybean Meal:**
 - Soybean meal is the **most important protein source** used to feed farm animals. It is also used for human consumption in some countries.
 - It represents nearly **two-thirds of the total world output** of protein feedstuffs, including all other major oil meals and fish meals.
 - Soybean meal is the **by-product of the extraction of soybean oil.**
- **About Essential Commodities Act 1955:**
 - **Background:** The ECA Act 1955, was legislated at a time when the country was facing a scarcity of foodstuffs due to persistent low levels of foodgrains production.
 - The country was dependent on imports and assistance (**such as wheat import form the US under PL-480**) to feed the population.
 - To prevent hoarding and black marketing of foodstuffs, the Essential Commodities Act was enacted in 1955.
 - **Essential Commodity:** There is **no specific definition of essential commodities** in the Essential Commodities Act, 1955.

- **Section 2(A)** states that an “essential commodity” means **a commodity specified in the Schedule of the Act.**
- **Legal Jurisdiction:** The Act gives powers to the central government to add or remove a commodity in the Schedule.
 - The Centre, if it is satisfied that it is necessary to do so in public interest, can notify an item as essential, in consultation with state governments.
- **Objective:** The ECA 1955 is used to **curb inflation** by allowing the Centre to enable control by state governments of trade in a wide variety of commodities.
- **Implementing Agency:** The Ministry of Consumer Affairs, Food and Public Distribution, implements the Act.
- **Impact:** By declaring a commodity as essential, the government can control the production, supply, and distribution of that commodity, and impose a stock limit.
- **Issues Related to Essential Commodities Act 1955:**
 - The **Economic Survey 2019-20** highlighted that government intervention under the ECA 1955 often distorted agricultural trade while being totally ineffective in curbing inflation.
 - Such intervention does enable opportunities for rent-seeking and harassment. Rent-seeking is a

term used by economists to describe unproductive income, including from corruption.

- Traders tend to **buy far less than their usual capacity and farmers** often suffer **huge losses during surplus harvests of perishables**.
- This led to farmers being unable to get better prices due to **lack of investment in cold storage, warehouses, processing and export**.
- Owing to these issues, the Parliament passed the **Essential Commodities (Amendment) Bill, 2020**. However, due to farmers' protest the Government had to repeal this law.

Way Forward

- The ECA 1955 was brought when India was not self-sufficient in food grains production. However, now **India has become surplus in most agri-commodities**, and the amendments in the ECA 1955 is an important step by the government to achieve its target of doubling farmers' income and also for ease of doing business.

Source: PIB

Certification Course on Home Energy Audit

GS Paper - 2 - GS Paper - 3 , Conservation , Government Policies & Interventions

The screenshot shows a Zoom meeting in progress. The main content is a presentation slide titled "Certification Course on Home Energy Audit". The slide includes the BEE logo, a diagram of a house with various energy-saving icons (like a lightbulb, a fan, and a water tap), and a photo of a man holding a "HOME ENERGY AUDIT MANUAL". Below the photo, it says "SDA Logo" and "SDA Name". At the bottom of the slide, it mentions "Course conducted under the guidance of ENERGY MANAGEMENT CENTRE - KERALA". The meeting interface shows a grid of participants, a chat window with "GA" and "+133", and a name "Gautam An...". The bottom of the slide says "National Energy Conservation Week 2021" and "8".

Why in News

Recently, the **Bureau of Energy Efficiency (BEE)** has launched a **Certification Course on Home Energy Audit (HEA)** during **National Energy Conservation Week: 8th–14th December 2021**.

- Earlier **the BEE** had felicitated various industrial units, institutions and establishments with **31st National Energy Conservation Awards (NECA)** on the occasion of **National Energy Conservation**

Day (14th December) to showcase India's achievements in energy efficiency and conservation.

Bureau of Energy Efficiency

- The BEE is a statutory body established through the **Energy Conservation Act, 2001** under the Union Ministry of Power.
- It **assists in developing policies and strategies** with the primary objective of **reducing the energy intensity** of the Indian economy.
- BEE **coordinates with designated consumers, designated agencies, and other organisations** to identify and utilise the existing resources and infrastructure, in performing its functions.

Key Points

- **About HEA:**
 - HEA enables appropriate **accounting, quantification, verification, monitoring, and analysis of energy use of various energy-consuming equipment** and appliances.
 - It also enables the submission of a **technical report with feasible solutions and recommendations for improving energy efficiency**, with a cost-benefit analysis and action plan to reduce energy consumption.
 - The certification program (Course) will **create awareness** on the importance and benefits of energy audit and **energy efficiency and**

conservation among students from engineering/diploma colleges.

• Objectives:

- Creation of a pool of professionals **to perform home energy audits** based on the needs of the consumer.
- Domestic consumers **to get Home Energy Audit carried out through** their respective SDA (State Designated Agency) **Certified Home Energy Auditor.**
- Dissemination of information and **raising awareness** among engineering/diploma/ITI students, energy professionals, and industry partners about the importance and benefits of energy auditing, energy efficiency, and conservation.

• Significance:

- It will ultimately lead to a **reduction in energy bills and the carbon footprint** of the consumer.
 - A carbon footprint is **the total amount of greenhouse gases** (including carbon dioxide and methane) that are generated by our actions.
- It will increase employability of youth **in the domain of energy efficiency, climate change mitigation, and sustainability.**

• India's Status at Energy Conservation:

- At the **COP-26 summit in Glasgow**, India announced its plans to increase non-fossil fuel power generation capacity to 500 GW by 2030. India is running what will become the world's largest clean energy programme, with an aim of having 175 GW of clean energy capacity by 2022.
- India's non-fossil fuel-based capacity has met the 40% target under its **Nationally Determined Contribution (NDC)** at COP 21.
- Installed power capacity from **non-fossil fuels will go up to 66% by 2030**. Also, India has **already reached an emission reduction of 28%**.

Other Initiatives Related to Energy Conservation

- **Perform Achieve and Trade Scheme:**
- **National Action Plan on Climate Change (NAPCC).**
- **Standards and Labeling.**
- **Energy Conservation Building Code (ECBC).**
- **Demand Side Management.**
- **ECO Niwas Samhita 2018.**
- **Bharat Stage-IV (BS-IV) to Bharat Stage-VI (BS-VI).**
- **UJALA scheme.**
- **International Solar Alliance.**
- **The National Action Plan on Climate Change (NAPCC).**

Source:PIB

Winter Air pollution in North India

GS Paper - 2 , Health , GS Paper - 3 , Environmental Pollution & Degradation



Why in News

The **Centre for Science and Environment (CSE)** has analyzed air quality trends with special focus on cities outside **Delhi and the National Capital Region (NCR)**.

- The latest analysis by the has found that when **pollution spikes during winter**, entire northern India experiences smog episodes.

Note

- **Particulate Matter:**
 - **Particulate Matter (PM)**, also called **particle pollution**, is a term for a **mixture of solid particles and liquid droplets** found in the air.
 - **It includes:**
 - **PM 2.5:** It refers to fine **particulate matter** smaller than 2.5 micrometres in diameter.
 - **PM10:** inhalable particles, with diameters that are **generally 10 micrometres and smaller**.
 - **Sources of PM:** Some are emitted directly from a source, such as construction sites, unpaved roads, fields, smokestacks or fires.
- **Centre for Science and Environment (CSE):**
 - CSE is a **public interest research and advocacy organisation** based in New Delhi.
 - It researches into, lobbies for and communicates the urgency of development that is both sustainable and equitable.

Key Points

- **About:**
 - This analysis aims to understand the **synchronised pattern of pollution** during winter

when **atmospheric changes entrap pollution** across the region.

- This analysis has covered **137 continuous ambient air quality monitoring stations (CAAQMS)** spread across 56 cities in the six states.
 - **CAAQMS** facilitates in measuring a real time monitoring of **Air Pollution**, including particulate matter, all round the year.
- The **northern region has been divided into five sub-regions** which include:
 - **Punjab and Chandigarh**
 - **NCR** (includes Delhi and 26 other cities/towns that fall within NCR)
 - **Haryana** (excluding cities already included in NCR)
 - **Uttar Pradesh** (excluding cities in NCR)
 - **Rajasthan** (excluding cities in NCR).
- This is an assessment of annual and seasonal trends in **PM 2.5 concentration** for the period 1st January 2019 to 30th November, 2021.
- **Methodology and Data:**
 - A huge volume of data points have been cleaned and data gaps have been addressed based on the **USEPA (United States Environmental Protection Agency)** method.
 - Meteorological data for the analysis is sourced from the Palam weather station of the **India Meteorological Department (IMD)**.

- Fire count data is from **National Aeronautics and Space Administration (NASA)’s Fire Information for Resource Management System**, specifically the **Visible Infrared Imaging Radiometer Suite (VIIRS)**.
- Estimates of contribution of **farm stubble fire smoke** to Delhi’s air quality is sourced from the Union Ministry of Earth Science’s System of **Air Quality and Weather Forecasting and Research (SAFAR)**.
- **Important Findings:**
 - **Pollution levels in smaller towns:** Most smaller towns have **considerably lower annual average PM2.5 levels**, but **during early winter** when the smog engulfs the entire region and farm stubble fires spike it further, **smaller towns report levels comparable to Delhi**.
 - **Early winter smog is synchronised across the region, but lasts longer in Delhi-NCR:** Normally, the smog episodes of November synchronise across the northern region.
 - But they linger longer only in Delhi, NCR and Uttar Pradesh during the rest of the winter.
 - Atmospheric changes during winter that **lead to inversion, calm conditions, change in wind direction, and seasonal drop in ambient temperature** entraps pollution across north India.

- This is further tripped into a severe category by **smoke from farm fires and Diwali firecrackers during November.**
- **Number of days with air quality in ‘very poor’ and ‘severe’ categories:** Delhi and NCR cities lead the chart for the most ‘severe’ days in 2021.
- **Cities vulnerable to the pollution build-up:** While the whole of north India is vulnerable to the pollution build-up, **the overall annual average of Delhi and NCR is among the highest in the region.**
- **Industrial towns remain vulnerable throughout the year:** The heavy and prolonged monsoon this year brought down PM 2.5 levels substantially across the region.
 - Even though the monsoon reduced overall pollution in the region, the levels in industrial cities were comparatively higher than other cities during monsoon.
- **Problem of farm fires:** Farm fires are one of the biggest episodic events during winter.
 - Two levels of analysis have been carried out: The **daily trend in fire count** and the **trend in average Fire Radiative Power (FRP) reported by NASA satellites.**
 - **FRP is the rate of emitted radiative energy by the fire** at the time of observation that is reported in MW (megawatts).

- FRP is considered a better measure of emissions from biomass burning as intensity of FRP indicates the quantum of biomass burned.
- This year, Punjab has noted the maximum number of fires after Haryana, UP, Rajasthan and Delhi.
- **Nitrogen dioxide (NO₂) levels:** There is a **significant increase in the amount of NO₂ in air during November** compared to October and September.
- NO₂ comes entirely from combustion sources and significantly, from vehicles.
- **Diwali continues to be a mega pollution event:** Despite the restrictions on bursting firecrackers, Diwali night still got extremely toxic.

Initiatives to Control Air Pollution

- **The Commission for Air Quality Management in National Capital Region (NCR) and Adjoining Areas.**
- **Bharat Stage (BS) VI norms.**
- **Dashboard for Monitoring Air Quality.**
- **National Clean Air Programme.**
- **National Air Quality Index (AQI).**
- **Air (Prevention and Control of Pollution) Act, 1981.**
- **Pradhan Mantri Ujjwala Yojana (PMUY).**

Way Forward

- The analysis has **put a spotlight on the cities of Punjab, Haryana, Uttar Pradesh, Rajasthan, Delhi and NCR** to understand the synchronised pattern of pollution during winter when atmospheric changes entrap pollution across the region.
 - It shows even smaller cities with lower annual average levels, record pollution levels that are as bad or even worse than Delhi.
 - This demands **action at scale and speed across all key sectors of pollution in the larger region.**
- The stark evidence from the northern region underscores the **urgent need for harmonised action in all states** to ensure access to clean fuels and technology in industry and power plants, massive scaling up of public transport, walking and cycling infrastructure and enhanced municipal services for complete segregation of waste and recycling.

Source: DTE

Pt. Madan Mohan Malaviya

GS Paper - 1 - Important Personalities , Modern Indian History



Why in News

Recently, the Prime Minister has paid tributes to Pt. Madan Mohan Malaviya on his Jayanti.

Key Points

- **Birth:** 25th December 1861, in Allahabad (now Prayagraj) in Uttar Pradesh.
- **Brief Profile:**
 - He was a **great educationist, pioneer, an eloquent rhetorician**, and a national leader.
 - He took part in numerous activities like the **freedom struggle movements, promotion of industries**, the economic and social development of the country, education, religion, social service, development of Hindi language and many other issues of national importance throughout his life.
 - He was given the **title of 'Mahamana'** by **Mahatma Gandhi** and the second President of India, **Dr. S. Radhakrishnan** gave him the status of a '**Karmayogi**'.
- **Role in Freedom Struggle:**
 - In the freedom struggle, he was midway between the Liberals and the Nationalists, the Moderates and the Extremists, as the followers of **Gokhale** and **Tilak** were respectively called.

- In 1930, when **Mahatma Gandhi** launched the **Salt Satyagraha and the Civil Disobedience Movement**, he participated in it and courted arrest.
- **Role in Congress:**
 - He was elected as the **President of the Congress committee** (four times) in 1909, 1918, 1932 and 1933.
 - **Sengupta was elected Congress chief in 1933** after president-elect Madan Mohan Malviya was arrested.
- **Contributions:**
 - Remembered for his **role in ending the Indian indenture system**, especially in the Caribbean.
 - Indentured labour was a **system of bonded labour** that was instituted following the abolition of slavery in 1833.
 - Indentured labour were recruited to work on sugar, cotton and tea plantations, and rail construction projects in British colonies in West Indies, Africa and SouthEast Asia.
 - Apprehensive of the possibility of the British completely damming the flow of Ganga at Bhimgoda in Haridwar, he **set up the Ganga Mahasabha in 1905**.
 - He was a **social reformer and a successful legislator**, serving as a member of the Imperial Legislative Council for 11 years (1909–20).

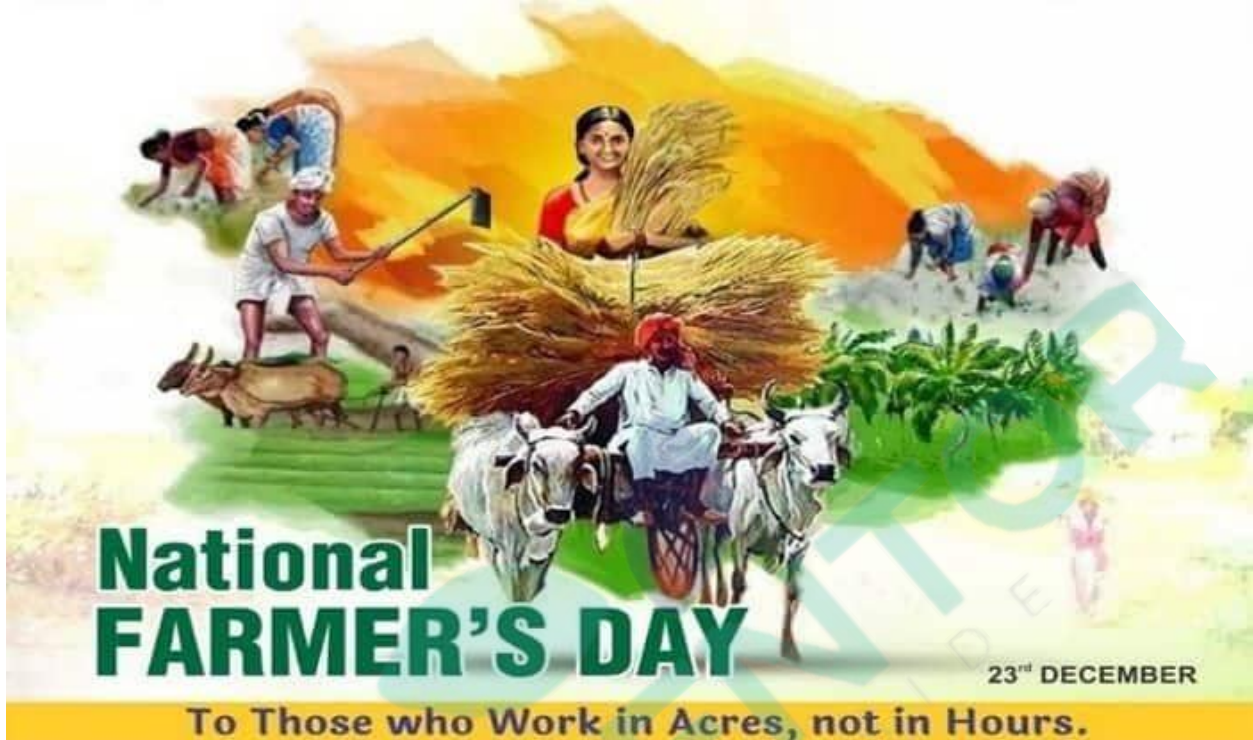
- **Popularized the term ‘Satyamev Jayate’.** However, the phrase originally belongs to the **Mundaka Upanishad**. The term now is the national motto of India.
- **Devnagri was introduced in the British-Indian courts** because of Malviya’s efforts with the British government.
- Worked immensely for **Hindu-Muslim unity**. He is known to have given **famous speeches on communal harmony**.
 - He was expelled from the Brahmin community for expressing his views on caste discrimination and Brahmanical patriarchy.
- He **helped establish the Hindu Mahasabha (“Great Society of Hindus”)** in 1915.
- He **founded the Banaras Hindu University (BHU) in 1916**.
- **Journalist:**
 - As a journalist, he started a **Hindi weekly, Abhyudaya in 1907** and made it a daily in 1915 and also **Hindi monthly, Maryada in 1910**.
 - He started an **English daily- Leader in 1909**.
 - Malaviya was the **editor of Hindi weekly, the Hindustan and Indian Union**.
 - He was also the **Chairman of the Board of Directors of the Hindustan Times** for many years.

- **Death:** He died on **12th November, 1946**, at the age of 84.
- **Awards and Honours:**
 - In 2014, he was posthumously conferred with **Bharat Ratna**, the country's highest civilian award.
 - In 2016, the Indian Railways started the Varanasi-New Delhi Mahamana Express in the leader's honour.

Source: PIB

Kisan Diwas

GS Paper - 2 - GS Paper - 1 , Important Personalities



Why in News

The '**Kisan Diwas**' or **National Farmers Day** is observed across the country on 23rd December to celebrate the birth anniversary of **Chaudhary Charan Singh**, the former Prime Minister of India.

- It is celebrated to **promote awareness among the citizens** to understand the importance of the **contributions of the farmers** to the society and overall economic and social development of a country.
- Government also aims to **encourage the farmers** across the country by organising various activities like debates and seminars on agriculture.

Key Points

- He was born in 1902 at Noorpur in Meerut district of Uttar Pradesh and **was the Prime Minister of India from 28th July 1979 to 14th January 1980.**
- Being a proponent of rural and agricultural development he made continuous efforts for keeping agriculture at the centre of planning for India.
- He was given the nickname **‘Champion of India’s Peasants’** for his work towards upliftment of farmers and development of agriculture throughout the country.
- He took a **leading part in formulation and finalisation of the Debt Redemption Bill 1939**, in order to give relief to the peasantry from moneylenders.
- He was instrumental in bringing about the **Land Holding Act, 1960** which was aimed at lowering the ceiling on land holdings to make it uniform throughout the State.
- He **left Congress in 1967** and formed his independent party known as the **Bharatiya Lok Dal.**
- He served **twice as Chief Minister of Uttar Pradesh.** He became **Prime Minister of India in 1979.**
- He was the author of **several books and pamphlets**, including **‘Abolition of Zamindari’, ‘Co-operative Farming X-rayed’, ‘India’s Poverty and its Solution’, ‘Peasant Proprietorship or Land to the Workers’** and **‘Prevention of Division of Holdings Below a Certain Minimum’.**

Importance of Agriculture in India

- Almost half of **India's rural households have insignificant stakes in agriculture.**
- According to the **2019 Situation Assessment Survey (SAS)**, there are **93.1 million agricultural households** in rural India.
- An agricultural household is defined as one **which produced field or horticultural crops, livestock, or other specified agricultural products** worth more than Rs 4,000 and had a member self-employed in agriculture in the 365 days preceding the survey.

Source:HT