



Phenome India-CSIR Health Cohort Knowledgebase (PI-CheCK)

[Source: PIB](#)

Recently, the **Council of Scientific and Industrial Research (CSIR)** announced the successful conclusion of the **first phase** of the longitudinal health monitoring project, the '**Phenome India-CSIR Health Cohort Knowledgebase**' (PI-CheCK).

- Launched in 2023, PI-CheCK aims to assess risk factors in [Non-communicable \(cardio-metabolic\) Diseases](#) within the Indian populace.
 - This unique initiative, which has enrolled nearly 10,000 participants providing extensive health data across various parameters, utilises a **cost-effective Standard Operating Procedure** for sample collection developed by CSIR.
 - A **nationwide longitudinal study** is being conducted for the **first time** to improve prediction models for cardio-metabolic diseases by considering genetic and lifestyle risk factors, to understand their increasing risk in the Indian population and develop better strategies for prevention and management.
- CSIR was **established in September 1942**, headquartered in New Delhi and funded by the Ministry of Science and Technology.

Read more: [Non-Communicable Diseases](#), [Council of Scientific and Industrial Research \(CSIR\)](#)

Tarang Shakti-2024

[Source: TH](#)

India will host its **first multinational air exercise** called **Tarang Shakti-2024** in August 2024, with the participation of 10 countries and some others as observers.

- It is inspired by the **Red Flag exercise** hosted by the US.
- The exercise will be held in 2 phases, with the first phase in southern India and the second in the western sector.
- **Australia, France, Germany, Japan, Spain, the United Arab Emirates, the United Kingdom, and the United States** are expected to participate.
- Germany will showcase the **A-400M aircraft**, which will be displayed for the **Indian Air Force (IAF)** as it is being considered as a potential option for the current open tender seeking medium transport aircraft.
- Recently, IAF participated in the 2nd edition of **air exercise Red Flag 2024** from 4th to 14th June 2024 in Alaska.
 - **Indian Rafales** participated in joint exercises with Singaporean and American **aircraft**. The missions involved **beyond-visual range combat exercises** in offensive counter-air and air defence roles as part of large force engagements.

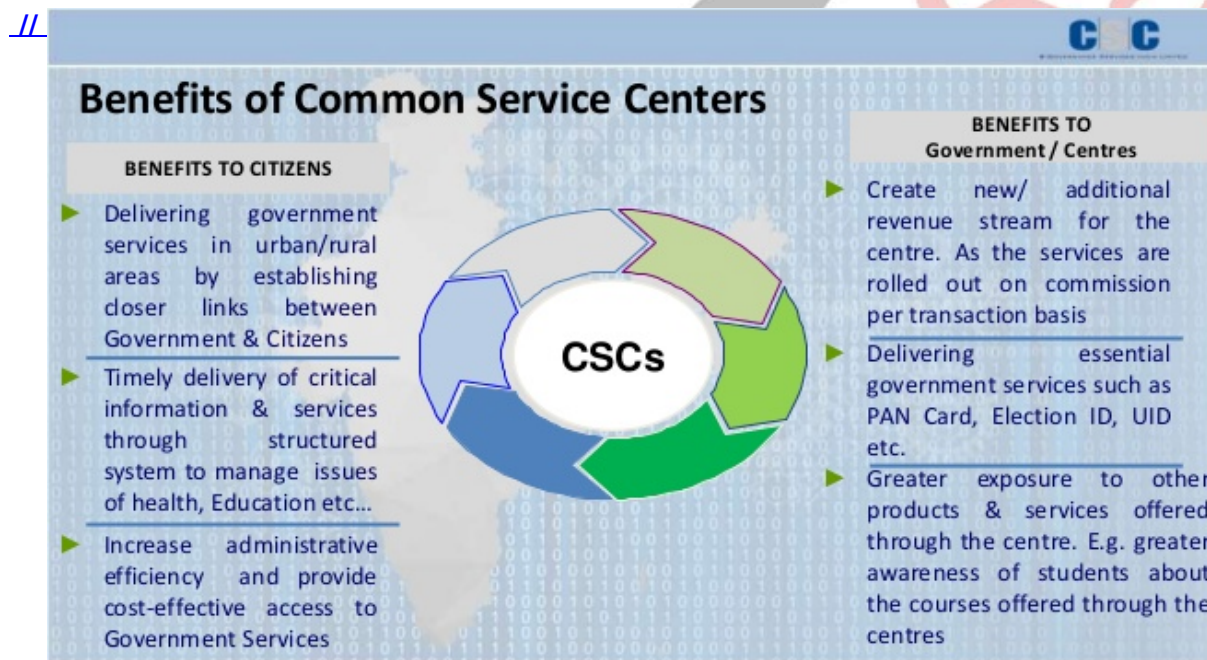
[Read more...](#)

MoU to Convert 10,000 FPOs into CSCs

Source: PIB

Recently, the [e-Governance](#) service provider **Common Services Centres Special Purpose Vehicle (CSC SPV)** and the **Ministry of Agriculture & Farmers Welfare** have signed a **Memorandum of Understanding (MoU)** to convert 10,000 [Farmer Producer Organisations \(FPOs\)](#) into [Common Service Centres \(CSCs\)](#).

- It will benefit farmers associated with FPOs registered under the '[Formation & Promotion of 10,000 FPOs Scheme](#)' by providing them citizen-centric services and increase **employment opportunities** in rural areas.
- '**Formation and Promotion of 10,000 FPOs**' is a **central-sector scheme** launched in **2020**.
 - It aims to **enhance farmers' bargaining power, reduce production costs, and increase farmers' incomes** through aggregation of agricultural produce.
- **CSCs scheme**, which is one of the mission mode projects of the [Digital India Programme](#), are providing various services to farmers, including **tele-consultation, crop insurance, e-veterinary, [Kisan Credit Card](#), and [PM Kisan](#) schemes.**



Read More: [Common Services Centres \(CSC\), Farmers Producer Organisation, Formation & Promotion of 10,000 FPOs](#)

First All-India Survey on AYUSH

For Prelims: National Survey on [AYUSH](#), AYUSH, Ministry of Ayush, National Ayush Mission

For Mains: Initiatives Related to AYUSH, Importance of Traditional Medicine

Source: PIB

Why in News?

Recently, the **Ministry of Statistics and Programme Implementation (MoSPI)** released the findings of a national survey on [Ayurveda, Yoga & Naturopathy, Unani, Siddha and Homoeopathy \(AYUSH\)](#) systems of medicine.

What are the Highlights of the Survey?

▪ About:

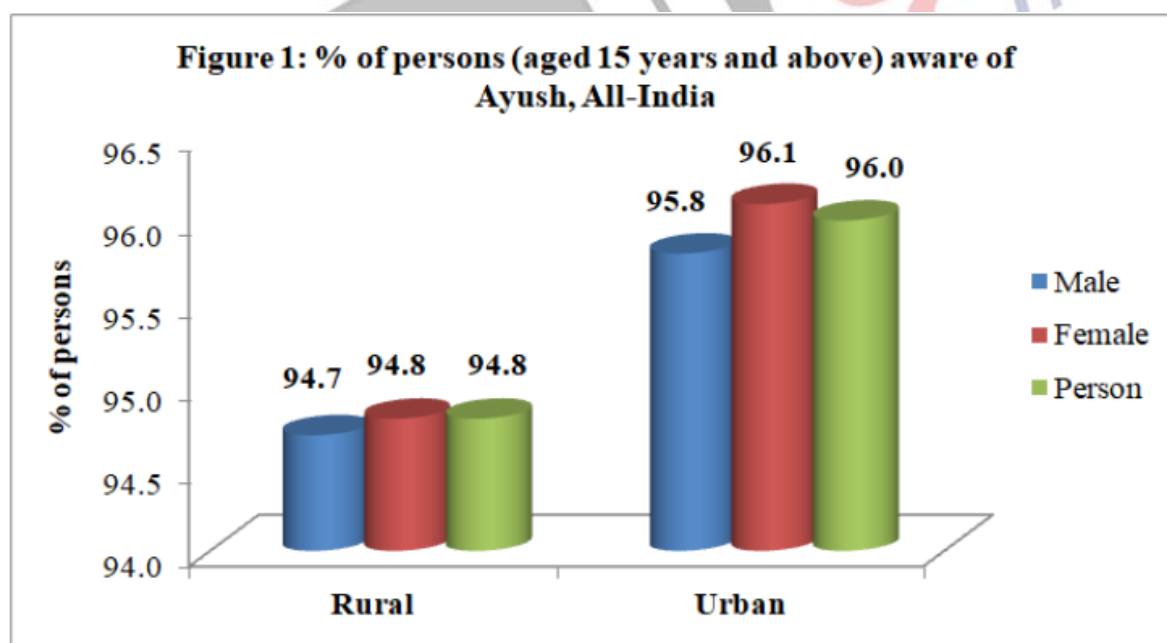
- This is the first-ever all-India AYUSH survey conducted by the [National Sample Survey Office \(NSSO\)](#) from July 2022 to June 2023, that provides valuable insights into the utilisation patterns of these traditional healthcare practices within the Indian population.
 - This survey covered the entire Indian Union, excluding a few inaccessible villages in the [Andaman & Nicobar Islands](#).

▪ Objectives: To collect information on:

- **Awareness** of people about the traditional system of healthcare (AYUSH system of medicine).
- **Uses of AYUSH** for prevention or treatment of ailments.
- Awareness of the households about home remedies, medicinal plants, local health tradition/folk medicine.
- Gathering information on household expenditure for treatments using AYUSH medicine systems.

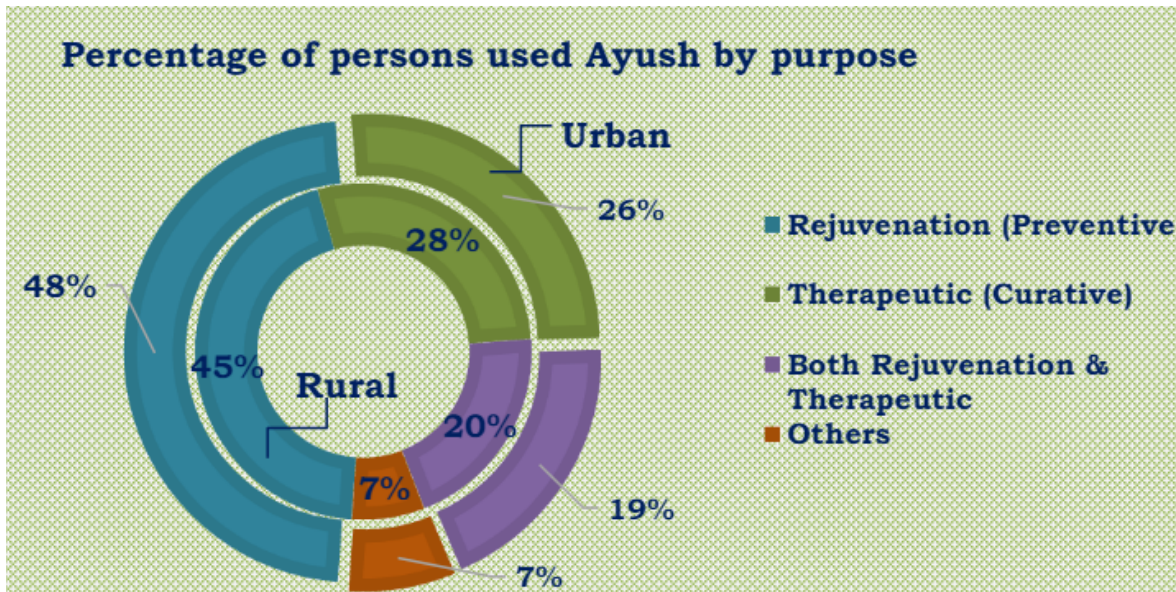
▪ Key Findings:

- **Awareness of AYUSH:**



- In **rural** India, around **95% of males and females** (aged 15 and above) are knowledgeable about AYUSH, while in **urban areas** the awareness rate is around **96%**.
- About **79% of households in rural India** and about **80% in urban India** have at least one member aware about **medicinal plants and home medicines**.
- Around **24%** of the households (in both rural and urban India) have at least one member aware about **folk medicine or local health tradition**.

- **Use of AYUSH:**
 - Around **53% of people in urban** areas and **46% in rural** areas have **used AYUSH** for prevention or treatment of ailments, during the last 365 days.
- **Expenditure Incurred for Availing Treatment of AYUSH:**
 - The average expenditure per person for prevention or treatment of ailments using AYUSH stood at **Rs. 574/person in urban areas** and **Rs. 472/person in rural areas**.
- **Use of AYUSH System by Purpose:**



- **Practice of Yoga:**
 - In around **1.1 crore households in rural India** and around **1.4 crore in urban India**, at **least one member** of the household is found to **practice yoga regularly**.

AYUSH

- AYUSH is the acronym of the medical systems that are being practised in India such as:
 - **Ayurveda:** Ancient system emphasising holistic well-being.
 - **Yoga:** Union of body, mind, and spirit through physical postures and meditation.
 - **Naturopathy:** Natural healing using elements like water, air, and diet.
 - **Unani:** Balance restoration through herbal medicines and humoral theory.
 - **Siddha:** Traditional Tamil medicine with roots in five elements and humours.
 - **Homoeopathy:** Highly diluted remedies stimulating self-healing responses.
- These systems are based on **definite medical philosophies** and represent a way of **healthy living with established concepts** on **prevention of diseases** and promotion of health.
- The Ministry of AYUSH, is responsible for developing education, research and propagation of AYUSH in India.

AYUSH Systems of Medicine

AYUSH encompasses Ayurveda, Yoga & Naturopathy, Unani, Siddha, Sowa Rigpa, and Homeopathy, with Ayurveda having a documented history of 5000+ years.

Ayurveda

- ↳ **Samhita Period (1000 BC):**
Emerged as mature medical system
 - ↳ **Charaka Samhita:** Oldest and most authoritative text
 - ↳ **Sushruta Samhita:** Gives fundamental principles and therapeutic methods in eight specialties
- ↳ **Main Schools:**
 - ↳ **Punarvasu Atreya** - School of physicians
 - ↳ **Divodasa Dhanvantari** - School of surgeons

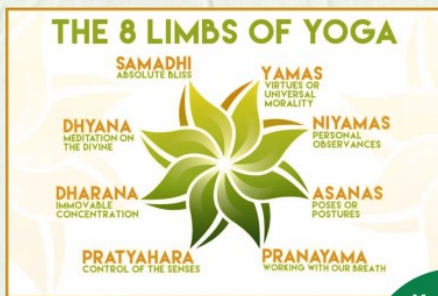
Lord Brahma is believed to be the 1st proponent of Ayurveda

Branches of Ayurveda:

- Kayachikitsa (internal medicine)
- Shalya Tantra (surgery)
- Shalakyana Tantra (disease of supra-clavicular origin)
- Kaumarabhritya (paediatrics)
- Agada Tantra (toxicology)
- Bhootavidya (psychiatry)
- Rasayana Tantra (rejuvenation and geriatrics)
- Vajikarana (eugenics & science of aphrodisiac)



Yoga & Naturopathy



- ↳ **Naturopathy:** Healing with help of 5 natural elements - Earth, Water, Air, Fire and Ether
 - ↳ Based on theories of self-healing capacity of body and principles of healthy living
 - ↳ Encourages a **person-centred approach** rather than disease-centred

Yoga first propounded by Maharishi Patanjali in systematic form Yogsutra

Unani

Pioneered in Greece, developed by Arabs as 7 principles (Umoor-e-Tabbiya)

- ↳ Based on the framework of teachings of **Buqrat** (Hippocrates) and **Jalinoos** (Galen)
 - ↳ Hippocratic theory of **four humors** viz. blood, phlegm, yellow bile, and black bile
- ↳ **Recognised by WHO** and granted official status by India as an alternative health system

Siddha

Dates back to 10000 – 4000 BC; Siddhar Agasthiyar - Father of Siddha Medicine

- ↳ Preventive, promotive, curative, rejuvenative, and rehabilitative health care
- ↳ **4 Components:** Latro-chemistry, Medical practice, Yogic practice & Wisdom
- ↳ Diagnosis based on 3 humors (**Mukkutram**) and 8 vital tests (**Ennvagai Thervu**)

Sowa Rigpa

Origin: Lord Buddha in India before 2500 years

- ↳ Traditional medicine in Himalayan regions of Ladakh, Himachal Pradesh, Arunachal Pradesh, etc.
- ↳ Recognised in India by Indian Medicine Central Council Act, 1970 (As amended in 2010)

Homeopathy

German physician Dr. Christian F. S. Hahnemann codified its fundamental principles

- ↳ Medicines prepared mainly from natural substances (plant products, minerals, animal sources)
- ↳ Brought in India by European missionaries - 1810; official recognition - 1948
- ↳ **3 Key Principles:**
 - ↳ *Similia Similibus Curentur* (let likes be cured by likes)
 - ↳ Single Medicine
 - ↳ Minimum Dose



What are the Government Schemes Related to Promotion of AYUSH in India?

Centrally Sponsored Schemes:

National Ayush Mission:

- It was launched in 2014 to promote the traditional and cost-effective AYUSH system of medicine in India.
- It focuses on strengthening infrastructure development, promoting education and research, manpower augmentation, and quality control in AYUSH.

Central Sector Schemes:

Ayur Gyan:

- The scheme **aims to promote education, research, and innovation** in Ayush and has been approved for the period from FY 2021-22 to FY 2025-26.
- It involves 2 components: **Capacity Building and Continuing Medical**

Education (CME) in AYUSH to provide training and bridge knowledge gaps for AYUSH professionals and **Research & Innovation in AYUSH** to supports research in AYUSH systems, focusing on priority areas aligned with national health programs.

- **AYURSWASTHYA:**
 - The AYURSWASTHYA Yojana's Centre of Excellence program **grants money to organisations and institutes** working in AYUSH. This funding helps them improve their facilities, research, and overall operations.
- **Champion Service Sector Scheme:**
 - It aims to **boost medical tourism** in India. It goes beyond just promoting traditional medicine systems like Ayurveda and Yoga.
 - The scheme also aims to **attract a surge of international patients, tourists, and visitors** seeking these unique healthcare options in India.
- **Promotion of International Cooperation in AYUSH:**
 - It aims to promote and strengthen awareness and interest about AYUSH Systems of Medicine and to facilitate International promotion, development and recognition of AYUSH.
- **Ayush Oushadhi Gunvatta Evam Utpadan Samvardhan Yojana:**
 - It aims to upgrade AYUSH medicine quality and manufacturing in India making them safer, more trusted, and potentially exported worldwide.
- **Conservation, Development, and Sustainable Management of Medicinal Plants:**
 - It aims at promotion, cultivation and preservation of **medicinal plants**.
 - The **National Medicinal Plant Board** set up by the Ministry of AYUSH aims to support the growth and cultivation of medicinal plants and to coordinate development efforts across different ministries, departments, and organisations.

Other Schemes Related to AYUSH

- [New Portals on AYUSH Sector](#)
- [AYUSH Entrepreneurship Programme](#)
- [AYUSH Wellness Centers](#)
- [ACCR Portal and AYUSH Sanjivani App](#)
- [AYUSH Holistic Wellness Centre \(AYUSH HWC\)](#)

Drishti Mains Question

Q. Discuss the role of AYUSH systems of medicine in promoting preventive healthcare and reducing the burden on conventional healthcare systems in India. Suggest measures to further integrate and leverage the strengths of AYUSH for a holistic healthcare approach.

UPSC Civil Services Examination, Previous Year Question (PYQ)

Mains

Q. How is the Government of India protecting traditional knowledge of medicine from patenting by pharmaceutical companies? (2019)