

OFFICERS' PULSE

Issue no.46 |10th April to 16th April, 2022



**AT A GLANCE
& IN DEPTH.**

COVERAGE.

The Hindu

The Indian Express

PIB

Rajya Sabha TV

All India Radio

Polity and Social Issues

Economy

International Relations

Environment

Science and Tech

Culture

CURRENT AFFAIRS WEEKLY
THE **PULSE** OF UPSC AT YOUR FINGER TIPS



News @ a glance

POLITY.....	3	1) Asian Development Bank.....	12
1) Rashtriya Gram Swaraj Abhiyan	3	2) G7 nations.....	12
2) PM GatiShakti.....	4	SCIENCE AND TECHNOLOGY	13
3) Ayushman Bharat.....	5	1) W Boson	13
ENVIRONMENT.....	6	DEFENCE	15
1) WHO's Air Quality Database	6	1) Indian Navy Indigenisation Plan (INIP).....	15
2) India may miss its 300 GW Solar Energy Target for 2030: Report.....	7	2) Smuggling in India	16
ECONOMY.....	8	ART AND CULTURE.....	17
1) National Monetisation Pipeline	8	1) Global Network of Silk Cities	17
2) How will cardless cash withdrawal system at ATMs work?.....	9	2) Sangeet Natak and Lalit Kala Akademi Awards.....	18
3) India projected to grow at 8% this fiscal: World Bank.....	10	PIB ANALYSIS.....	19
4) Why is India looking to boost wheat exports?.....	10	1) National Food Security Act.....	19
INTERNATIONAL RELATIONS	12	2) Production Linked Incentive Scheme	20
		3) Insolvency and Bankruptcy Code	20

News in Depth

AIR NEWS.....22

- 1) 'eSanjeevani'22
- 2) e-NAM.....23
- 3) Index of Industrial Production.....23

THE HINDU EDITORIALS.....24

- 1) Getting serious about supporting the care economy.....24

- 2) Healthcare as an Optional Public Service (HOPS)25

INDIAN EXPRESS EXPLAINED.....27

- 1) What is the '2+2' format of dialogue between India and the US?.....27

INFOGRAPHIC OF THE WEEK28

- 1) XENOTRANSPLANTATION.....28

News @ a glance

POLITY

1) Rashtriya Gram Swaraj Abhiyan

Rationale of the Scheme

- Mahatma Gandhi envisioned villages as mini-republics and advocated that true democracy should begin with participation from the grass-root level by the people of every village.
- The 73rd Constitutional Amendment mandated the **three tier Panchayati Raj Institutions (PRIs)** to function as units of local self-government and envisioned a people-led development at the grass roots level.
- Panchayati Raj System was mandated with the **twin objectives of ensuring economic development and social justice for the people living in the rural areas.**

About RGSA

- The **Union Budget 2016-17** announced the Rashtriya Gram Swaraj Abhiyan (RGSA) as a **Centrally Sponsored Scheme** for **building capabilities of Panchayati Raj Institutions for achieving Sustainable Development Goals (SDGs).**
- Key local development challenges faced by the country viz. poverty, public health, nutrition, education, gender, sanitation, drinking water, livelihood generation, etc. are in sync with SDGs and fall within the realm of Panchayats.
- The Panchayats have therefore been designated as a key player for implementation of the United Nations SDGs to be achieved by 2030.
- The scheme **extends to all States and UTs including non-Part IX areas** where Panchayats do not exist.

Focus of the scheme

- The scheme has a focus on ensuring **basic orientation training for the Elected Representatives (ERs) of Panchayats**, within six months of their election and **refresher training** within 2 years.
- RGSA will have thrust for **PRI-SHG (Self-Help Group) convergence** to ensure effective community mobilisation and greater public ownership of flagship programs of the government.
- **Use of e-governance and technology driven solutions** at Panchayat level will be increased to attain administrative efficiency, improved service delivery, and greater accountability.
- RGSA also aims at **enhancing capabilities of Panchayats to raise their own sources of revenue.**
- **Strengthening Gram Sabhas** to function effectively as the basic forum of people's participation is also a focus area of RGSA.
- It also aims at **promoting devolution of powers and responsibilities to Panchayats** according to the spirit of the Constitution and Provisions of the Panchayats (Extension to Scheduled Areas) Act, 1996.

Components of the scheme

The scheme consists of Central and State Components:

- The Central component comprises
 - National level activities viz. National Plan for Technical Assistance in collaboration with academic institutions/institutions of excellence for various activities of Capacity

- Building & Training (CB&T) for PRIs,
 - Mission Mode Project (MMP) on e-Panchayat and
 - Incentivization of Panchayats.
- The State component relates to
 - Activities to be undertaken by State Governments for CB&T
 - Strengthening of Gram Sabhas in PESA areas,
 - Distance Learning Facility,
 - Support for Innovations,
 - Technical support to PRIs,
 - Other activities for strengthening of Panchayats.

Why in News?

- The Cabinet Committee on Economic Affairs chaired by the Prime Minister Narendra Modi has approved continuation of revamped Centrally Sponsored Scheme of Rashtriya Gram Swaraj Abhiyan (RGSA) for implementation during the period from 01.04.2022 to 31.03.2026 (co-terminus with XV Finance Commission period) to develop governance capabilities of Panchayati Raj Institutions (PRIs).
- The total financial outlay of the scheme is Rs.5911 crore with the Central Share of Rs.3700 crore and that of State Share of Rs.2211 crore.

2) PM GatiShakti

About the project

- Last year, Prime Minister Narendra Modi **launched the “PM GatiShakti — National Master Plan”** for infrastructure development aimed at boosting multimodal connectivity and driving down logistics costs.
- PM GatiShakti is a **digital platform that connects 16 ministries** — including Roads and Highways, Railways, Shipping, Petroleum and Gas, Power, Telecom, Shipping, and Aviation- with a view to **ensuring holistic planning and execution of infrastructure projects.**
- The portal will offer **200 layers of geospatial data**, including on existing infrastructure such as roads, highways, railways, and toll plazas, as well as

geographic information about forests, rivers and district boundaries to aid in planning and obtaining clearances.

- The portal will also allow various government departments to track, in real time and at one centralised place, the progress of various projects, especially those with multi-sectoral and multi-regional impact.
- The objective is to **ensure that each and every department now has visibility of each other’s activities providing critical data while planning and execution of projects in a comprehensive manner.**
- The GatiShakti platform aims to **prevent such situations by addressing the issue of government departments working in silos.**
- The government expects the platform to enable various government departments to synchronise their efforts into a multi-modal network. It will also offer satellite imagery for monitoring of projects. It is also expected to help state governments give commitments to investors regarding timeframes for the creation of infrastructure.

How will the platform help bring down logistics costs?

- Studies estimate that **logistics costs in India are about 13-14% of GDP as against about 7-8% of GDP in developed economies.**
- High logistics costs impact cost structures within the economy, and also make it more expensive for exporters to ship merchandise to buyers.
- By incorporating infrastructure schemes under various ministries and state governments, and economic zones such as textile and pharmaceutical clusters and electronics parks, the GatiShakti platform aims to boost last-mile connectivity and bring down logistics costs with integrated planning and reducing implementation overlap.

Why in News?

- Minister of Commerce and Industry Piyush Goyal chaired a review meeting on PM GatiShakti.

3) Ayushman Bharat

About the scheme

- Ayushman Bharat is a flagship scheme of Government of India launched to achieve the vision of **Universal Health Coverage (UHC)**. It aims to undertake path breaking interventions to holistically address the healthcare system at the primary, secondary and tertiary level, by adopting a continuum of care approach.
- Launched in 2018, it is an umbrella of two major health initiatives, namely **Health and Wellness Centres** and **Pradhan Mantri Jan Arogya Yojana (PM-JAY)**.

Health and Wellness Centres

- Under this **1.5 lakh** existing Sub Health Centres (SHC), Primary Health Centres (PHC) and Urban Primary Health Centres (UPHC) to be transformed as **Health Wellness Centres (HWC)** by 2022.
- These centres will deliver **Comprehensive Primary Health Care** that is **universal and free** to users, with a focus on wellness and the delivery of an expanded range of services closer to the community.
- HWC are envisaged to deliver **expanded range services** that go beyond Maternal and child health care services to include care for non-communicable diseases, palliative and rehabilitative care, Oral, Eye and ENT care, mental health and first level care for emergencies and trauma, including free essential drugs and diagnostic services.

Pradhan Mantri Jan Arogya Yojana

- It is one significant step towards the achievement of **Universal Health Coverage (UHC)** and **Sustainable Development Goal - 3** (SDG3: "Ensure healthy lives and promote well-being for all at all ages").
- AB-PMJAY will provide financial protection to **10.74 crore** poor,

deprived rural families and identified occupational categories of urban workers' families as per the latest **Socio-Economic Caste Census (SECC) data** (approx. 50 crore beneficiaries) that form the bottom 40% of the Indian population. It will offer a benefit cover of **Rs. 5,00,000 per family per year**.

- The benefits of Rs. 5,00,000 are on a **family floater basis** which means that it can be used by one or all members of the family.
- This cover will take care of **almost all secondary care and most of tertiary care procedures**.
- To ensure that nobody is left out (especially women, children and elderly) there will be **no cap on family size and age** in the scheme.
- The benefit cover will also include **pre-hospitalization and post-hospitalization expenses** such as diagnostics and medicines.
- A defined **transport allowance** per hospitalization will also be paid to the beneficiary.
- Benefits of the scheme are **portable across the country** and a beneficiary covered under the scheme will be allowed to take cashless benefits from **any public/private empanelled hospitals** across the country.

Implementation Strategy

- At the national level to manage, a **National Health Authority** has been set up. It will be chaired by the Minister of Health & Family Welfare which will enable the decision making at a faster pace, required for smooth implementation of the scheme.
- States/ UTs are advised to implement the scheme by a dedicated entity called State Health Agency (SHA).

Why in News?

- Union Health Minister, Dr. Mansukh Mandaviya chaired the 4th Anniversary celebrations of Ayushman Bharat - Health and Wellness Centres (AB-HWCs).

For doubts and queries email us at doubts@officerspulse.com

ENVIRONMENT

1) WHO's Air Quality Database

What is the Air Quality Database?

- The air quality database is a **compilation of data on air quality and the concentrations of particulate matters** in the air.
- It was started in **2011** and has since then been periodically updated.
- The database intends to **help in studies about diseases due to air pollution** by providing robust estimates of population exposure.
- Each year, the WHO has been publishing the database with ground measurements of air quality and particularly the concentration of particulate matters **PM 2.5 and PM 10**.
- In 2011, observations from almost 1,100 cities across 91 countries were represented by the database for the period of 2003 to 2010.

What's new in the current update?

- Following the fifth update to the database this year, for the **first time**, the database contains the **ground measurements of annual mean concentrations of nitrogen dioxide**, which the WHO calls "a common urban pollutant and precursor of particulate matter and ozone." This data was not recorded in the previous versions of the database in 2011, 2014, 2016 and 2018.
- Also, close to **2,000 more cities/human settlements** were recording the data for PM 2.5 and PM 10 since the last update in 2018.
- The 2022 version will contain data about the annual means for **PM 2.5, PM 10 and nitrogen dioxide for the years between 2010 and 2019** from 6,743 human settlements in 117 countries.

Contaminants and their Effects

- The database records the levels of three contaminants namely, **particulate matters PM 2.5 and PM 10 and nitrogen dioxide**.

- **PM 2.5 and PM 10** represent particulate matters that have a diameter equal to or less than 2.5 microns and 10 microns respectively.
- According to WHO, the pollutants originate largely from **human activities related to fossil fuel combustion**.
- The WHO warns of growing evidence pointing to the dangers of air pollution to the human body and says that even low levels of many air pollutants could cause significant harm.
- While particulate matter, especially **PM 2.5, could enter deep into the lungs and the human bloodstream, causing cardiovascular, cerebrovascular and respiratory impacts, nitrogen dioxide is associated with respiratory diseases, particularly asthma**.

2021 Air Quality Guidelines

- The WHO, in its latest guidelines released in 2021, specifies the annual average of the concentration limits for major pollutants.
- Accordingly, an annual average of **5 µg/m³ is accepted for PM 2.5 and for PM 10, the accepted level is 15 µg/m³**. For nitrogen dioxide, the accepted annual average is **10 µg/m³**.
- The guidelines also specify accepted 24-hour averages for the pollutants. The levels are **15 µg/m³, 45 µg/m³ and 25 µg/m³ for PM 2.5, PM 10 and nitrogen dioxide** respectively.

Key Observations

- Among countries in the high-income group, **17% of cities had levels of PM 2.5 and PM 10 below the WHO's threshold**, whereas in low- and middle-income countries **less than one per cent of the cities** were found compliant.
- Notably, only about **4,000 cities/human settlements across 74 countries collect nitrogen dioxide data at the ground level**.

- Overall, 23% of people in these cities breathe levels of nitrogen dioxide that are accepted by WHO's guidelines.

Steps for improving Air Quality

- WHO has urged countries to implement national air quality standards in line with its guidelines along with **usage of clean household energy, implementation of stricter vehicle emissions** and efficiency standards among other measures.

Why in news?

- The World Health Organization (WHO), in a report specified that nearly **99% of the global population is breathing air that contains pollutants** beyond the accepted air quality limits.
- More than **6,000 cities spread across 117 countries are monitoring air quality** and people living in low- and middle-income countries suffer the most exposure to unhealthy levels of fine particulate matter and nitrogen dioxide.

2) India may miss its 300 GW Solar Energy Target for 2030: Report

What's the news?

- A new report by the **Institute for Energy Economics and Financial Analysis (IEEFA) and JMK Research** highlighted that India is likely to miss its solar energy target of 300 GW (gigawatt) for 2030 by around **86 GW**.
- It states that India is also expected to miss its goal of having **100 GW of installed solar capacity by about 27%** this year.

News in detail

- As of December 2021, India's cumulative **installed solar capacity was 55 GW**, with grid-connected utility-scale projects contributing 77%, and the rest coming from **grid-connected rooftop solar (20%) and mini or micro off-grid projects (3%)**.
- By December 2022, there is likely to be a **shortfall of 25 GW** from the 40 GW

rooftop solar target, and 1.8 GW from the 60 GW utility-scale solar target.

- The 27 GW shortfall from the 2022 target can be attributed to multiple challenges, including regulatory roadblocks, net metering limits, basic customs duty (BCD) on imported cells and modules, issues with the approved list of models and manufacturers (ALMM), unsigned power supply agreements (PSAs), banking restrictions, etc.
- With eight months of 2022 remaining, only about **50% of the 100 GW target has been met**. Approximately, **19 GW of solar capacity is expected to be added in 2022 – 15.8 GW from utility-scale and 3.5 GW from rooftop solar**.
- Between 2011 and 2021, the solar energy sector in India grew at a compound annual growth rate (CAGR) of **59% from 0.5 GW in 2011 to 55 GW in 2021**.
- The Centre launched the National Solar Mission in January 2010, under which the total installed capacity target was set at **20 GW by 2022**.
- In 2015, the target was revised to 100 GW, with no change in the timeline. Later in August 2021, the government increased the target to 300 GW for 2030.
- MNRE website recently stated that **India surpassed Italy to achieve the 5th global position in solar power deployment; the top four are China, the United States, Japan and Germany**.
- Eg: The utility scale segment is on track to achieve nearly 97% of its 60 GW target. On the other hand, rooftop solar has severely underperformed over the years, with just over a quarter of the 40 GW target being achieved. By December 2022, this segment is expected to fall short of its target by 25 GW.

For doubts and queries email us at: doubts@officerspulse.com

ECONOMY

1) National Monetisation Pipeline

About NMP

- Last year, Finance Minister Nirmala Sitharaman unveiled a four-year National Monetisation Pipeline (NMP) worth an estimated **Rs 6 lakh crore**. It **aims to unlock value in brownfield projects** (which are assets that are **already operational**) by engaging the private sector, transferring to them revenue rights in the projects, and **using the funds generated for infrastructure creation across the country**.
- Following through on the **government's plan to monetise public assets to fund fresh capital expenditure on infrastructure**, the centre released a list of projects and facilities to be offered to private investors over the next four years through structured leasing and securitisation transactions.

What is the National Monetisation Pipeline?

- The NMP names a **list of public assets that will be leased to private investors**. **Only brown-field assets** are planned to be leased out under the NMP. So, to give an example, an airport that is already operational may be leased out to an investor.
- Importantly, there **won't be any transfer of ownership** from the government to the private sector when assets are leased out.
- The government only plans to **cede control over its assets for a certain period of time**, after which the assets must be returned to the government unless the lease is extended.

Will NMP help the economy?

- The government believes that leasing out public assets to private investors will help **free capital that is stuck in these assets**. For example, say the government has invested thousands of crores in a road project. It may take the government decades to recover its investment through the annual toll

revenues. Instead, the government can recover a good chunk of its investment by leasing out the right to collect toll for the next 30 years to a private investor.

- The government can use this money, in turn, to **build fresh infrastructure under the National Infrastructure Pipeline (NIP)**. In fact, the proceeds from the NMP are expected to account for **about 14% of the total outlay for infrastructure under the NIP**.
- The government believes all this spending will **boost economic activity**. Analysts also believe that the government has now through the NMP found the right model for infrastructure development.
- The government is best suited to **tackle the ground-level challenges in building infrastructure**, while the private sector can **operate and offer indirect finance to these projects** through the NMP.

What are the risks?

- The allocation of assets owned by governments to private investors is often **subject to political influence**, which can lead to **corruption**. In fact, many in the Opposition allege that the NMP will favour a few business corporations that are close to the government.
- The expected boost to economic activity due to higher government spending may also need to be **weighed against the opportunity costs**.
 - *Opportunity cost is the loss of other alternatives when one alternative is chosen.*
- For one, the money that the government collects by leasing out assets comes from the pockets of the private sector. So **higher government spending will come at the cost of lower private spending**.
- The NMP also **does not address the various structural problems** such as

legal uncertainties that hold back private investment in infrastructure.

- However, it is worth noting that economists generally believe that **scarce assets are better managed and allocated by the private sector than by the government**. So to the extent that the NMP frees assets from government control, it can help the economy.
- There are also concerns that the leasing of airports, railways, roads and other public utilities to private investors **could lead to higher prices for consumers**. If the government merely cedes control of public utilities to private companies without taking steps to foster greater competition, it can indeed lead to **poor outcomes for consumers**.

What lies ahead?

- The success of the NMP will depend on the **demand for brown-field government assets among private investors**. The government's past disinvestment projects such as the sale of Air India did not catch the fancy of investors owing to the stringent conditions set by the government.
- The **pricing of assets and the terms of sale** will thus determine the level of interest that private investors show for assets leased under the NMP.
- In the past, doubts have been raised about the allocation of airports and other assets to certain private business groups. So the **process that the government adopts** this time to allocate assets may come under scrutiny. There is likely to be the **demand for an open, competitive auction of assets**.

Why in News?

- The government has completed transactions worth ₹96,000 crore under the National Monetisation Pipeline (NMP) in 2021-22, surpassing the year's target of ₹88,000 crore.
- In 2021-22, while roads and highways monetised assets worth ₹23,000 crore, power sector closed the fiscal with overall monetisation of ₹9,500 crore, Mining of coal generated

monetisation value of ₹40,000 crore and mining of minerals garnered ₹18,700 crore. For Railways, this amount stood at about ₹800-900 crore

2) How will cardless cash withdrawal system at ATMs work?

Context

- Recently, India's central bank announced **cardless cash withdrawals at ATMs** in the country. The feature will let consumers use **Unified Payment Interface (UPI)** on their smartphones to withdraw cash from ATMs. All ATMs across the country must enable this feature in their cash-dispensing machines, the Reserve Bank of India (RBI) said.

How will this system work?

- Cardless cash withdrawals are to be **authenticated via UPI**. So, ATMs are expected to show an option for withdrawing cash using UPI. Once an user selects this option, they can input the amount to be withdrawn.
- A **QR code** will be generated on the ATM. Users will then need to scan that code via their UPI app, and enter **password** to withdraw cash from the ATM.
- Until now, only fund transfers between accounts were enabled via UPI. With this option, consumers can take cash out from ATMs without a card.

What issues does this tech solve?

- According to the RBI, cardless cash withdrawals will **enhance security of cash withdrawal transactions**. Besides, it would help **prevent frauds like card skimming and card cloning**.
- Currently, only existing customers of a few banks are allowed to withdraw cash without cards, and from specific bank's ATM networks. However, RBI's move to allow interoperability in cardless withdrawals will enable users to take cash from any bank's ATM.

What is card skimming?

- **Criminals steal data from credit or debit cards by tracking a card swiped at ATMs.** They pick this information from using a skimming device that **reads the card's magnetic strip.** These devices are surreptitiously installed on ATMs. And once the device picks up the data, it can be used to gain unauthorised access to the user's banking records.
- The stolen information can be **coded onto a new card**, a process called **cloning**, and be used to make payments and transact with other bank accounts. Problematic ATMs that function intermittently, and the ones located in isolated areas are often used to install such skimming devices.
- Fraudsters also install **scanning devices on point of sale machines.** These devices can stealthily scan a card before it is swiped at the payment counter at a departmental store. This is especially tough to spot if the billing counter is not in the line of sight of the card owner.
- These devices are difficult to identify as they appear to be a legitimate part of an existing ATM, or like a regular in-store card reader. It is skilfully fitted to the payment machines.

What are the limitations and challenges of card-less cash withdrawal feature?

- Currently, ICICI Bank, Kotak Mahindra Bank, HDFC Bank and SBI allow cardless cash withdrawals for their users.
- But, **accessing the feature is cumbersome.** And the feature has **certain withdrawal limits**, and the **transaction is charged.** The cardless feature at these banks work with each specific bank's app.
- At the moment, it is not clear whether UPI-based cash withdrawals will have the same restrictions and service fee.
- In cardless withdrawal, the **security vulnerability of a card is minimised, but the risk will soon transfer to a mobile-enabled feature.** The mobile can now become the epicentre of transactions, making it the next target for the fraudsters.

3) India projected to grow at 8% this fiscal: World Bank

What's in the news?

- **India is projected to grow at 8% over the current fiscal year** (April 1-March 31), and **7.1% over the next** (FY 2023-24) fiscal year, the **World Bank** said in its twice yearly **South Asia Economic Focus Reshaping Norms: A New Way Forward.**
- The country is estimated to have grown at **8.3% in the fiscal year that just passed**, following a contraction of 6.6% in the previous year owing to the COVID-19 pandemic.
- For the **South Asia region**, growth is expected to be slower than projected, by 1 percentage point, at **6.6% in 2022 and 6.3% next calendar year.** This is due to Russia's war on Ukraine, which has impacted the region, when it was already experiencing uneven and fragile growth, rising commodity prices, bottlenecks to supply and financial sector vulnerabilities.
- The impact of the war so far has been further inflation, deteriorating current account balances and growing fiscal deficits.

4) Why is India looking to boost wheat exports?

Context

- Russia's invasion of Ukraine and the subsequent western sanctions on Russia have affected wheat exports from the Black Sea region and impacted food security in several countries, especially in Africa and West Asia.
- The disruption to global wheat supplies in turn has thrown open opportunities that India's grain exporters are eyeing, especially given the domestic surplus availability of the cereal.
- Egypt, one of the largest importers of wheat, has recently agreed to source the cereal from India.

What is the status of India's wheat exports?

- Globally, Russia is the market leader for wheat exports (almost 15% share)

and Ukraine is also a major producer. Exports from these two countries have been hit by the war and sanctions.

- India expects to produce **112 million tonnes of wheat** in the current season. The government requires 24-26 million tonnes a year for its food security programmes. With **surplus wheat production**, opportunities have opened up for exports. Wheat exports in the 2021-2022 financial year were estimated at 7.85 million tonnes, a quadrupling from 2.1 million tonnes in the previous year.
- More countries are turning to India because of the competitive price, acceptable quality, availability of surplus wheat and geopolitical reasons. While the existing importers are buying more, new markets have emerged for Indian wheat. Exports this fiscal are expected to be almost 10 million tonnes worth \$3 billion.

Which new markets are expected to buy from India?

- The different grades of wheat produced in India are of the milling quality. So, apart from **Egypt and Jordan, countries in East Africa** are also likely to source the foodgrain from India.
- The Agricultural and Processed Food Products Export Development Authority (APEDA) and Ministry of Agriculture are also sending delegations to several countries to resolve market issues, if any.

What is being done to facilitate exports?

- The Commerce Ministry has put in place an **internal mechanism** to facilitate it and get the paperwork ready for the related sanitary and phytosanitary applications to help facilitate shipments.
- Wheat is going in full vessel loads and needs to be transported to the ports from the growing areas. The railways is providing rakes on priority to move the wheat.

What norms are buyer countries using to approve Indian wheat?

- Countries that have not previously imported wheat from India insist on the **completion of the Pest Risk Analysis** to provide market access. There are also other different standards that the buyers share with their sellers here. While, at present, Indian suppliers are able to meet these criteria, Indian authorities are working closely to step in and negotiate resolution if any unreasonable standards are stipulated.

What is the future outlook?

- The government is optimistic about the long-term export opportunities not only for wheat, but for all cereals including millets and superfoods.
- India has won the confidence of markets such as Sri Lanka and Bangladesh. It needs to establish itself in the new markets too and the government should facilitate it.

For doubts and queries email us at: doubts@officerspulse.com

INTERNATIONAL RELATIONS

1) Asian Development Bank

About ADB

- The Asian Development Bank (ADB) was founded in 1966 with the primary mission of fostering growth and cooperation among countries in the Asia-Pacific Region.
- It is headquartered in **Manila**, Philippines.
- At present, ADB comprises 68 members (including **India**)- of which 49 are from within Asia and the Pacific and 19 outside.
- The ADB was **modeled closely on the World Bank**, and has a similar weighted voting system where votes are distributed in proportion with members' capital subscriptions.
- The two largest shareholders of the ADB are the **US and Japan**.
- ADB is an official United Nations Observer.

Why in News?

- The government of India and the Asian Development Bank has signed a 2 million dollar Project Readiness Financing Loan for designing climate-resilient urban infrastructure, strengthening institutional capacity, and improving municipal resource mobilization in 16 district headquarters towns in Nagaland.
- The facility would support key preparatory activities for the ensuing project aimed at improving urban infrastructure and services in Nagaland to help the state realize its economic potential.

2) G7 nations

About G7

- The Group of Seven (G7) is a collective of seven of the world's most industrialized and developed economies. Their political leaders come together annually to discuss important global economic, political, social and security issues.
- The G7 member countries are the **United States, Britain, France, Japan, Germany, Italy, and Canada**.
- Russia belonged to the forum from 1998 through 2014, when the bloc was known as the G8, but was suspended following its annexation of Crimea.
- **India is not a member** of the G-7 grouping.



Why in News?

- Ukraine has asked G7 nations for 50 billion US dollars in financial support to help it cover a war-linked budget deficit over the next six months.

For doubts and queries email us at: doubts@officerspulse.com

SCIENCE AND TECHNOLOGY

1) W Boson

What is a boson?

- A **boson is a subatomic particle that carries force**, with an integer spin quantum number in particle physics.
- **Bosons are one of two fundamental subatomic particle types; fermions**, which have half-odd-integer spin, are the other.
- **Every subatomic particle that can be seen is either a boson or a fermion.**

What is a Higgs Boson?

- **The Higgs particle is a boson. All physical forces are assumed to be caused by bosons**, which are particles. **Photons, W and Z bosons, and the gluon are some of the other known bosons.**
- The Higgs boson is the fundamental particle associated with the Higgs field, a field that gives mass to other fundamental particles such as electrons and quarks.
- **The Nobel Prize-winning discovery of the Higgs boson** (commonly known as the "God particle") in 2012 **confirmed the Standard Model of physics**, which also predicts that a Higgs boson will decay to a pair of bottom quarks around 60% of the time. **Peter Higgs** was the first to hypothesise that this particle may exist in the 1960s.
 - The **Standard Model of particle physics** is a hypothesis that **classifies all known constituent particles and defines three of the four known fundamental forces** in the universe (**electromagnetic, weak, and strong interactions, excluding gravitational force**).
 - Each fundamental force has its own corresponding boson – the strong force is carried by the "gluon", the electromagnetic force is carried by the "photon", and

the "W and Z bosons" are responsible for the weak force. Although not yet found, the "graviton" should be the corresponding force-carrying particle of gravity.

W Bosons

- **The W boson is an elementary particle involved in radioactive decay and nuclear fusion.**
- There are four fundamental forces in the universe; one of them is the **weak nuclear force: it's involved in nuclear fusion reactions and for radioactive decay.**
- **This force is mediated by two particles: the two W bosons and the Z boson.** When two other particles exchange the W and/or Z bosons, they're said to be acted on by the weak nuclear force.

What's in the news?

- A new analysis of data collected at an experiment in the US before 2011 has revealed the **mass of the W boson to be higher than expected according to theory.**
- **The new measurement disagrees with the Standard Model of particle physics**, which describes the properties and behaviour of elementary particles.
- According to a new measurement, the mass of W bosons appears to be higher than that predicted by the Standard Model.

Significance

- There's a framework of rules that describes how the elementary particles of our universe look and behave that physicists have spent decades putting together, called the **Standard Model.**
- The Standard Model is famously **broken** but **physicists don't know how. The Model can't explain gravity and dark matter. It also can't explain why the Higgs boson is so heavy**, why the universe has more matter than antimatter, why gravity is

so weak or why the size of the proton is what it is.

- And now there's **new evidence that it's wrong about the mass of one particle.**
- So when a Standard Model prediction is found to be wrong in an experiment, **physicists can study the experiment more closely to understand where the**

value might have deviated. These deviations are broadly called 'new physics': they're what physicists **can use to fix the Standard Model.**

For doubts and queries email us at: doubts@officerspulse.com

DEFENCE

1) Indian Navy Indigenisation Plan (INIP)

Why in News:

- The Navy is looking to procure variants of the indigenous **Advanced Light Helicopter (ALH)** and **Light Utility Helicopters (LUH)** modified for ship-based operations.
- The Navy which has taken an early lead towards **indigenisation** decades ago and in 2014 **promulgated the Indian Navy Indigenisation Plan (INIP) 2015-2030** to enable indigenous development of equipment and systems is further ramping up indigenisation efforts especially in weapons and aviation related items.

What is Indian Navy Indigenisation Plan (INIP)

- In **pursuance** of the Government of India's vision of '**Make in India**', the Indian Navy has embarked upon an initiative to evolve a **guideline document, the "Indian Naval Indigenisation Plan (INIP) 2015-2030"**, to enunciate the need for developing various advanced systems for its platforms.
- This document supersedes the Indigenisation Plan published in 2008 for the period 2008-2022.
- This document is aimed to **enable indigenous development of equipment and systems over the next 15 years.**
- Some of the focus areas include indigenous design and development and production of **Anti-Submarine Weapons and sensors, Satcom** and electronic warfare equipment, **Anti-Ship Missiles** and Medium Range Surface to Air Missile, combat management system, software defined radios, network encryption devices, Link II communication system, main batteries for submarines, distress sonar system, components of missiles and torpedoes etc.

Outcomes

- **In-house indigenisation committees** have been formed to handle **indigenisation of spares** with respect to naval aircraft. In addition, the **Naval Liaison Cells (NLCs)** located at various places have been nominated as 'indigenisation cells'.
- The **Naval Innovation and Indigenisation Organisation (NIIO)** which was launched to provide a **flexible and accessible interface for academia and industry** with **Indian Navy** capability development apparatus
- **New Intellectual Property Rights** applications have been filed by Navy personnel (36 in the last 2 years).
- **Transfer of Technology to MSMEs** has already been undertaken
- Navy has now forward **deployed user inputs through Naval Project Management Teams at cluster Headquarters of DRDO**
- These have **interfaced** with the **DRDO labs and their Development cum Production Partners (DcPP)** to **provide user inputs at every stage to 15 futuristic Technology** and 100 plus DRDO projects underway for development of Indian Navy's combat capability

About ALH Mk-III

- The **indigenously designed and developed Advanced Light Helicopter (ALH-DHRUV)** is a **twin engine, multi-role, multi-mission** new generation helicopter in the 5.5 ton weight class.
- It is a multi-role chopper with the **Shakti engine** manufactured by Hindustan Aeronautics Limited (HAL).
- The helicopters are equipped with state-of-the-art equipment like **Surveillance Radar, Electro-Optic Pod, Medical Intensive Care Unit, High-intensity SearchLight, SAR Homer, Loud Hailer, Machine Gun** and can perform other key roles.

- Even at night, it will be able to alleviate low visibility during search and rescue operations.
- It possesses a 0.7 mm gun, giving it a significant capability in LIMO (low intensity maritime operations).
- The new autonomous flight control system outperforms the older version.
- These helicopters will usher a paradigm shift in the capability in ship-borne operations and **enhance coastal surveillance**.

About Light Utility Helicopter

- LUH is designed and developed as a **replacement for Cheetah & Chetak helicopters** which are being operated by Indian Armed forces.
- LUH is a new generation helicopter in the 3-Ton class incorporating the state of the art technology features like **Glass cockpit with Multi-Function Displays (MFD)** and powered by single Turbo Shaft engine with sufficient power margin to cater to demanding high altitude missions.

2) Smuggling in India

Why in News:

- **FICCI's** Committee Against Smuggling Counterfeiting Activities Destroying the Economy (**CASCADE**) **launched the first ever Anti-Smuggling Day** to raise its voice against the menace of smuggling across the globe.

Why is smuggling a menace?

- The **2021 Global Illicit Economy report** states that illegal markets have boomed, diversified, and become more networked over the last 20 years.
- The **18th century was known as the golden age of smuggling**, when England witnessed illicit trade of tea, tobacco, spices, silks, and spirits. Smuggling continued throughout the early 19th century but **declined after the conclusion of the Napoleonic Wars in 1815**, when the preventive effort was stepped up with the introduction of coastal blockades and coastguard.
- Several reports have indicated that in recent times, a plethora of illicit activities are performed systematically

by criminal enterprises which **include drug trafficking, human trafficking, illegal wildlife trade and illegal arms trafficking**. As an alternative to paper currency, gold and cigarettes are the most favoured for money laundering and illicit trade. They are high-value, easy-to-transport, making them vulnerable to smuggling.

- According to **Global Financial Integrity**, **illicit flows resulting from transnational crime such as arms, tobacco, or pharmaceuticals smuggling are valued at an average of \$1.6 trillion-\$2.2 trillion annually**.
- **WHO** estimates that regarding alcohol smuggling, the annual worth amounts to \$19.4 billion. In 2019, UNODC estimated the annual value of the trade in narcotics to be between \$400-\$600 billion worldwide.

Indian scenario

- In **India**, a **2019 FICCI CASCADE report** stated that the **top five sectors** where smuggling was rampant were **textiles, tobacco products, readymade garments, capital goods, and consumer electronics**, which were **damaging the economy to the tune of 1.17 trillion**.
- Since smugglers **evade legal duties and taxes**, they also put an **extra burden on the budget**, leading **citizens being deprived of much-needed resources**.
- **Inter-agency and inter-country cooperation, generating consumer awareness is needed**. This will eventually prevent victimisation of the people who are exposed to health and safety dangers posed by illicit products.

Directorate of Revenue Intelligence (DRI)

- The Directorate of Revenue Intelligence (**DRI**) is the **premier intelligence and enforcement agency of the Government of India on anti-smuggling matters**.
- It is **under the Central Board of Indirect Taxes & Customs, Ministry of Finance**.

For doubts and queries email us at: doubts@officerspulse.com

ART AND CULTURE

1) Global Network of Silk Cities

Why in News:

- **Bengaluru** has become the **first Indian city** to get into the **global network of silk cities**.

About the global network of silk cities

- The **network spans nine nations and thirteen cities**.
- The Network **assists artisans and craftsmen in exchanging information**, establishing **trade relationships**, and learning about **various crafting skills**.
- Silk Cities aims to combine existing knowledge and know-how in these nations with high-profile, up-to-date worldwide research in order to bridge the gap between theory and practise.
- These encounters will **increase public awareness of current concerns** and encourage people to look for solutions.

What are the other locations under consideration?

- The **Murshidabad** area of **West Bengal**, which has been producing quality silk for over 300 years, **may join the Global Silk City Network in the future**.
- The history of silk weaving in Murshidabad goes back to the **early eighteenth century during the Mughal rule**, when the Nawab of Bengal, Murshidkuli Khan, shifted his capital from Dhaka to a town on the east of the Bhagirathi river, and named it Murshidabad.

Silk In India

- India has a rich and complex history in silk production and its silk trade which dates back to the 15th century.
- Sericulture industry provides employment to approximately 8.7 million persons in rural and semi-urban areas in India.
- **India has the unique distinction of being the only country producing all the five known commercial silks, namely, mulberry, tropical tasar, oak tasar, eri and muga**, of which

muga with its golden yellow glitter is unique and prerogative of India.

- **North East** has the **unique distinction** of being the **only region producing four varieties of silk** viz., Mulberry, Oak Tasar, Muga and Eri. Overall North Eastern region contributes 18% of India's total silk production.
- **India** is the **second largest producer of silk** in the world and **also the largest consumer of silk in the world**. Among the four varieties of silk produced in 2020-21, **Mulberry** accounted for **70.72%** (23,860 MT)

Geographical Indications of Indian silk

1. Baluchari Saree – West Bengal
2. Salem Silk – Tamil Nadu
3. Arani Silk – Tamil Nadu
4. Molakalmuru Sarees – Karnataka
5. Ilkal Sarees – Karnataka
6. Muga Silk – Assam
7. Orissa Ikat – Odisha
8. Kancheepuram Silk – Tamil nadu
9. Mysore Silk – Karnataka
10. Chanderi Fabric – Madhya Pradesh

Policy initiatives taken for the development of silk industry

Sericulture is the functional area under the **Ministry of Textiles**. Some of the recent policy initiatives taken by the Ministry to promote sericulture are as follows.

- **National Silk Policy 2020**
- Sericulture is included as agriculture allied activity under Rashtriya Krishi Vikas Yojana. This enables the sericulturists to avail the benefits of the scheme for the entire sericulture activities up to reeling.
- **Forest Conservation Act** has been amended to treat non mulberry sericulture as forest based activity enabling the farmers to undertake Vanya silkworm rearing in the natural host plantation in the forests.
- **Anti dumping duty** on Chinese raw silk

Related Information

- The **Central Silk Board** is a **statutory body** which functions under the

administrative control of the **Ministry of Textiles, Government of India.**

Mission

- Make continuous efforts in Research and Development and Technology Transfer
- To create greater opportunities for gainful employment and improved levels of income in sericulture through spread of scientific sericulture practices
- To improve productivity in all stages of silk production
- Strengthen levels of efficiency through a commitment to quality.

2) Sangeet Natak and Lalit Kala Akademi Awards

Why in News:

- Eminent artists were presented the Sangeet Natak Akademi Fellowship and Sangeet Natak Awards while the Lalit Kala Akademi's Fellowship and National Awards for 2021 were given by Vice-President M. Venkaiah Naidu.

About the awards

- The **Sangeet Natak Akademi Awards** are national honours bestowed by the Government on **performing artists as well as teachers and scholars in the field of performing arts.**
- The awards are given in the **categories of music, dance, and theatre. In addition, one category is reserved for traditional, folk, and tribal dance, music, theatre and puppetry.**
- An award each was also given for overall contribution and scholarship in Performing Arts.

Sangeet Natak Akademi Fellowship

- The **Sangeet Natak Akademi Fellowship** is the highest honour conferred by Sangeet Natak Akademi without distinction of **nationality, race, caste, religion, creed, or sex.**
- The criteria restricts any person below the age of 50 to ordinarily be considered for the honour.

The Sangeet Natak Akademi

- The Sangeet Natak Akademi is **India's national music, dance, and drama academy.**
- It is currently an **autonomous body within the Ministry of Culture, Government of India, and its initiatives and programmes are wholly funded by the government.**
- The Akademi creates and oversees institutions and programmes in the performing arts that are of national significance, like the **National School of Drama** in New Delhi, Jawaharlal Nehru Manipur Dance Academy in Imphal, Supporting Kutiyattam (Kerala's Sanskrit theatre), Eastern India's Chhau dances, Assamese Sattriya customs, and other national projects

Lalit Kala Akademi

- The **Lalit Kala Akademi** has instituted several awards and honours to be conferred on artists in **recognition for their outstanding work in the field of art.**
- The Akademi was founded on the 5th of August, **1954**
- **Under the Societies Registration Act 1860,** the Akademi was given **statutory authority in 1957.**
- Since its inception, it has served the whole country by **promoting Indian artists' creative endeavours and introducing their arts** to a vast number of people, thereby playing a significant part in defining and reinventing the sensibility of a complete culture within the visual arts spectrum.
- **Fellow of the Lalit Kala Akademi** is regarded as the **highest honour conferred on an artist by the Lalit Kala Akademi.**

For doubts and queries email us at doubts@officerspulse.com

PIB ANALYSIS

1) National Food Security Act

About NFSA

- The National Food Security Act, 2013 (NFSA) provides for **food and nutritional security** in the human life cycle approach, by ensuring access to adequate quantity of quality food at affordable prices for people to live a life with dignity and for matters connected therewith or incidental thereto.
- The Act is in line with **Goal Two of the Sustainable Development Goals** (which seeks sustainable solutions to end hunger in all its forms by 2030 and to achieve food security) set by the United Nations General Assembly.
- Schemes such as the **Mid-Day Meal Scheme (MDM)**, the **Public Distribution System (PDS)**, and the **Integrated Child Development Services (ICDS)** are included under the Act.
- The implementation of the scheme comes under the ambit of the **Ministry of Consumer Affairs, Food and Public Distribution**.

Key Features

- The Act legally entitled up to **75% of the rural population and 50% of the urban population** to receive subsidized foodgrains under the **Targeted Public Distribution System (TPDS)**.
- The eligible persons will be **entitled to receive 5 Kgs of foodgrains per person per month at subsidised prices of Rs. 3/2/1 per Kg for rice/wheat/coarse grains**. The existing **Antyodaya Anna Yojana (AAY) households**, which constitute the poorest of the poor, will continue to receive 35 Kgs of foodgrains per household per month.
- About two-thirds of the population, therefore, is covered under the Act to receive highly subsidized foodgrains.
- The Act also has a special focus on the nutritional support to women and children. **Pregnant women and**

lactating mothers will be entitled to meals and **maternity benefits of not less than Rs 6000**.

- **Children upto 14 years of age** will be entitled to nutritious meals as per the prescribed nutritional standards. In case of non-supply of entitled foodgrains or meals, the beneficiaries will receive **food security allowance**.
- The Act also contains provisions for setting up of **grievance redressal mechanism** at the District and State levels
- The **eldest women of the household** of age 18 years or above will be the head of the household for the purpose of issuing ration cards.

Implementation

- It is operated under the **joint responsibility of the Central and the State/Union Territory (UT) Governments**.
- The Central Government is responsible for procurement, allocation and transportation of food grains up to the designated depots of the Food Corporation of India.
- States/UTs hold the operational responsibilities for allocation and distribution of food grains.
- The NFSA currently covers **81 crore people** which was determined on the basis of the **2011 census**, and has not been revised since the law was passed in 2013.

Why in News?

- For procurement operations under MSP and seamless distribution of foodgrain under Pradhan Mantri Garib Kalyan Ann Yojana (PMGKAY) and National Food Security Act 2013 (NFSA), during Financial Year 2021-22 Department of Food & Public Distribution released Rs.2,94,718/- Crore towards Food Subsidy to Food Corporation of India and State Governments.

2) Production Linked Incentive Scheme

About the scheme

- The Production Linked Incentive (PLI) aims to give companies **incentives on incremental sales from products manufactured in domestic units**. Apart from **inviting foreign companies to set shop in India**, the scheme also aims to **encourage local companies to set up or expand existing manufacturing units**.
- In April last year, the central government had for the first time notified the PLI scheme for **mobile phones and allied component manufacturing**.
- As a part of the scheme, companies which set up new mobile and specified equipment manufacturing units or expanded their present units would get **incentives of 4 to 6 per cent**, after they achieve their investment and production value target for each year.
- Later, the government announced **expansion of the PLI scheme to include 13 more sectors** such as automobile and automobile components, pharmaceutical drugs, textile products, food products, high efficiency solar photo-voltaic modules, white goods such as air conditioners and LED bulbs, speciality steel products, drones and drone components, etc.

Why is the production linked scheme needed?

- The PLI schemes have been introduced as a **key element of the Atma Nirbhar Bharat package** to transform the manufacturing landscape of the Indian economy and integrate it into the global supply chains.
- The strategy behind these schemes is to offer companies **incentives on incremental sales from products manufactured in India, over the base year**.
- They have been specifically designed to **boost domestic manufacturing in sunrise and strategic sectors, curb cheaper imports and reduce import bills, improve cost competitiveness**

of domestically manufactured goods, and **enhance domestic capacity and exports**.

Why in News?

- The Ministry of Textiles has selected 61 applicants under the Production Linked Incentive (PLI) Scheme for Textiles. Government approved Production-Linked Incentive (PLI) Scheme for Textiles products, namely MMF Apparel, MMF Fabrics and Products of Technical Textiles, for enhancing India's manufacturing capabilities and enhancing exports with an approved financial outlay of Rs 10,683 crore over a five-year period. To further boost the growth of the sector, centre also removed the import duty of cotton.

3) Insolvency and Bankruptcy Code

About IBC

- The Insolvency and Bankruptcy Code (IBC) creates a time-bound process for insolvency resolution of companies and individuals. These processes will be completed within **180 days** (unless extended by a one-time extendable period of **90 days**). If insolvency cannot be resolved, the assets of the borrower may be sold to repay creditors (known as *liquidation*).
- The resolution processes are conducted by licensed **insolvency professionals (IPs)**. These IPs are members of **insolvency professional agencies (IPAs)**.
- **Information utilities (IUs)** are established to collect, collate and disseminate financial information to facilitate insolvency resolution.
- The **National Company Law Tribunal** adjudicates insolvency resolution for companies and Limited Liability Partnerships. The **Debt Recovery Tribunal (DRT)** adjudicates insolvency resolution for individuals and partnership firms.
- The **Insolvency and Bankruptcy Board of India (IBBI)** regulates the functioning of IPs, IPAs and IUs.

- IBC was later amended with the provision to **bar promoters from bidding for their own companies**. It prevented defaulters from regaining control of their companies at a cheaper value
- The code was again amended in 2019 which mandated a deadline for the completion of the resolution process **within 330 days, including all litigation and judicial processes**.

Why in News?

- As part of the ongoing 'Azadi Ka Amrit Mahotsav' celebrations, the Insolvency and Bankruptcy Board of India (IBBI) is set to conduct the '3rd National Online Quiz on Insolvency and Bankruptcy Code, 2016', to promote awareness and understanding of the Code among various stakeholders, across the country.

For doubts and queries email us at doubts@officerspulse.com

News in Depth

AIR NEWS

1) 'eSanjeevani'

About 'eSanjeevani'

- Launched in 2009 by the **Ministry of Health & Family Welfare** 'eSanjeevani' is a **web-based comprehensive telemedicine solution**. It aims to provide healthcare services to patients in their homes.
- Besides enhancing the quality of medical services, addressing issues about uneven distribution and shortage of infrastructural as well as human resources, eSanjeevani also aims to make healthcare services equitable by **bridging the digital divide** that exists between the urban vs. rural, rich vs. poor etc.
- eSanjeevani can also be used to provide **medical education** to interns, people across Various Common Service Centers (CSCs), etc.
- The portal was designed & developed by the **Centre for Development of Advanced Computing (C-DAC)**, a premier R&D organization of the Ministry of Electronics and Information Technology (MeitY).

Services provided

- eSanjeevani platform has enabled two types of telemedicine services viz.
 - Doctor-to-Doctor (eSanjeevani) and
 - Patient-to-Doctor (eSanjeevani OPD) Tele-consultations.

eSanjeevani

- It is being implemented under the **Ayushman Bharat Health and Wellness Centre (AB-HWC)**. It aims to implement Doctor-to-Doctor teleconsultation in all the 1.5 lakh Health and Wellness Centres in conjunction with identified Medical

College hospitals in a 'Hub and Spoke' model.

- States have identified and set up dedicated 'Hubs' in Medical Colleges and District hospitals to provide teleconsultation services to 'Spokes', i.e SHCs, PHCs and HWCs.

eSanjeevani OPD

- Owing to the ongoing COVID-19 pandemic, the Health Ministry launched the second tele-consultation service enabling patient-to-doctor telemedicine through 'eSanjeevaniOPD'.
- This service is available as an Android mobile application as well. This has made it convenient for the people to avail of the health services without having to travel.
- This e-health service is offered free of cost and has proved a boon in containing the spread of COVID while simultaneously enabling provisions for non-COVID essential healthcare.

Why in News?

- Over three lakh e-Sanjeevani Tele-consultations were provided to the people in a single day (on 16th April 2022) through the Ayushman Bharat Health and Wellness Centres across the country.
- This is the highest number of teleconsultations ever done at Ayushman Bharat Health and Wellness Centres on a single day, surpassing its earlier record of 1.8 lakh teleconsultations per day.
- More than 1.17 lakh Health and Wellness Centres are now operational in the country and the common citizens are taking advice from the top doctors through this facility.

2) e-NAM

About

- Launched in 2016, the National Agricultural Market (e-NAM) is a pan-India electronic trading portal which targets to connect almost 7,000 existing mandis run by Agricultural Produce Market Committees (APMC) to create a **unified national market for agricultural commodities**.
- e-NAM is completely funded by the Central Government and implemented by **Small Farmers Agribusiness Consortium (SFAC)**.

Benefits of the portal

- e-NAM platform promotes better marketing opportunities for the farmers to sell their produce through an online competitive and transparent **price discovery system** and **online payment facility**.
- It also promotes prices commensurate with quality of produce.
- The e-NAM portal provides **single window services** for all APMC related information and services. This includes commodity arrivals, quality & prices, buy & sell offers & e-payment settlement directly into farmers' account, among other services.
- Farmers can access the information on e-NAM easily through their **mobile phones from anywhere**. This online trading platform aims at reducing transaction costs, bridging information asymmetry and helps in expanding the market access for farmers.

Why in News?

- e-NAM the pan-India electronic trading portal has completed six years of implementation.

- A total of 1000 mandis of 18 states and 3 union territories have been integrated with e-nam platform and more than one crore 72 lakh farmers have registered on this platform so far.
- The agricultural produce trade with a value of one lakh 82 thousand crore rupees have been recorded so far on e-nam platform.

3) Index of Industrial Production

About IIP

- The Index of Industrial Production (IIP) details the growth of various sectors in an economy such as mineral mining, electricity and manufacturing.
- It is compiled and published every month by the **National Statistical Office (NSO)** under the **Ministry of Statistics and Programme Implementation**.
- The current base year is **2011-2012**.
- The **Eight Core Industries** (Coal, Crude Oil, Natural Gas, Refinery Products, Fertilizers, Steel, Cement and Electricity) comprise 40.27 per cent of the weight of items included in the IIP.

Why in News?

- The country's factory output (IIP) continued to pick up pace in February this year. According to the data released by the Ministry of Statistics and Programme Implementation, IIP rose 1.7 percent in February 2022 compared to a revised estimate of 1.5 percent in January this year.

For doubts and queries email us at doubts@officerspulse.com

THE HINDU EDITORIALS

1) Getting serious about supporting the care economy

Background:

- This year, to commemorate International Women's Day, the ILO brought out its new report titled, '**Care at work: Investing in care leave and services for a more gender-equal world of work**'.
- Care work encompasses direct activities such as feeding a baby or nursing an ill partner, and indirect care activities such as cooking and cleaning.

Types of care workers:

- Since March 2020, the demand for care services has skyrocketed.
- Whether paid or unpaid, direct or indirect, care work is vital for human well-being and economies.
- **Unpaid care work** is linked to labour market inequalities, yet it has yet to receive adequate attention in policy formulation.
- **Paid care workers**, such as domestic workers and anganwadis in India, also struggle to access rights and entitlements as workers.

Advantages of care work:

- Greater investment in care services can create an **additional 300 million jobs** globally, many of which will be for women.
- In turn this will help **increase female labour force participation** and advance Sustainable Development Goal (SDG) 8.
- To nurture childcare and elderly care **services will deliver the benefits of child development, aging in dignity and independent living** as the population grows older and also generate more and better employment opportunities, especially for women.

Challenges faced:

- **Access to quality and affordable care** services such as childcare, elderly care and care for people with

disabilities is a challenge workers with family responsibilities face globally.

- Though childcare and anganwadi workers undertake important work, and childcare is recognised as professional work in advanced countries, they **lack recognition as workers** and do not have requisite access to workers' rights and entitlements in India.
- Domestic workers became **ad hoc care workers** during the novel coronavirus pandemic without adequate social or health protection measures.

Role of Government:

- India spends **less than 1% of its GDP** on the care economy; increasing this percentage would unfurl a plethora of benefits for workers and the overall economy.
- In consultation with employers and workers organisations and the relevant stakeholders, the Government needs to **conceptualise a strategy and action plan** for improved care policies, care service provisions and decent working conditions for care workers.
- The ILO proposes a **5R framework** for decent care work centred around achieving gender equality.
- The framework urges the **Recognition, Reduction, and Redistribution** of unpaid care work, promotes **Rewarding** care workers with more and decent work, and enables their **Representation** in social dialogue and collective bargaining.

Conclusion:

- A human-centred and inclusive recovery from the COVID-19 pandemic that benefits workers, employers, and the government, requires a more significant investment in and commitment to supporting the care economy, which cares for the society at large.

- Care work should be viewed as a **collective responsibility and public good**.

2) Healthcare as an Optional Public Service (HOPS)

Universal Health Care (UHC):

- UHC has become a well-accepted objective of public policy around the world.
- The basic idea of UHC is that **no one should be deprived of quality health care for the lack of ability to pay**.
- It has even been largely realised in many countries, not only the richer ones but also a growing number of other countries such as Brazil, China, Sri Lanka and Thailand.
- **Thailand** made a decisive move towards **UHC at a time (20 years ago)** when their per capita GDP was no higher than India's per capita GDP today.

Routes to UHC:

- UHC typically relies on one or both of **two basic approaches**: public service and social insurance.
- In the first approach, health care is provided as a **free public service**, just like the services of a fire brigade or public library.
- The second approach allows private as well as public provision of health care, but the costs are mostly borne by the **social insurance fund(s)**, not the patient, so the result is similar: everyone has access to quality health care.
- Social insurance is one where insurance is **compulsory and universal, financed mainly from general taxation, and run by a single non-profit agency** in the public interest.
- This single-payer system makes it easier for the state to bargain for a good price from health-care providers.

Challenges in UHC:

- In the absence of public health centres, dedicated not only to primary health care but also to preventive work, there is a danger of patients rushing to expensive hospitals every other day.

This would make the system wasteful and **expensive**.

- Recent evidence suggests that even small **co-payments often exclude** many poor patients from quality health care.
- Another challenge with social insurance is to **regulate private health-care providers**. Here, a crucial distinction needs to be made between for-profit and non-profit providers.

Healthcare as an Optional Public Service (HOPS):

- The idea is that everyone would have a legal right to receive **free, quality health care in a public institution if they wish**.
- It would not prevent anyone from seeking health care from the private sector at their own expense.
- But the public sector would **guarantee decent health services to everyone as a matter of right, free of cost**.
- In Kerala and Tamil Nadu, for instance, most illnesses can be satisfactorily treated in the public sector, at little cost to the patient.
- There is a thriving private sector too, begging for better regulation and restraint.
- But health care of decent quality is available to **everyone as an optional public service**.
- There is a case for social insurance to work mainly within the non-profit sectors (public and private), leaving out for-profit health care as far as possible.

Challenges in HOPS:

- HOPS would not be as egalitarian as the NHS or national health insurance model where most people are in the same health-care boat.
- UHC does **not mean unlimited health care**: there are always limits to what can be guaranteed to everyone.

Best approach:

- **Tamil Nadu** is well placed to make HOPS a reality under its proposed **Right to Health Bill**.
- Tamil Nadu is already able to provide most health services in the public sector with good effect.

- A Right to Health Bill would be an invaluable affirmation of the State's commitment to quality health care for all.
- It would empower patients and their families to demand quality services, helping to improve the system further.

For doubts and queries email us at doubts@officerspulse.com

INDIAN EXPRESS EXPLAINED

1) What is the '2+2' format of dialogue between India and the US?

Why in the news?

- The fourth '2+2' dialogue between India and the United States is underway in Washington DC. **India's External Affairs and Defence Ministers** are meeting with their American counterparts.

2+2 talks between India and allies

- The 2+2 dialogue is a format of meeting of the foreign and defence ministers of India and its allies on strategic and security issues.
- A 2+2 ministerial dialogue enables the partners to better understand and appreciate each other's strategic concerns and sensitivities taking into account political factors on both sides, in order to build a stronger, more integrated strategic relationship in a rapidly changing global environment.
- India has 2+2 dialogues with **four key strategic partners: the US, Australia, Japan, and Russia.**

- Besides Russia, the other three countries are also India's partners in the Quad.

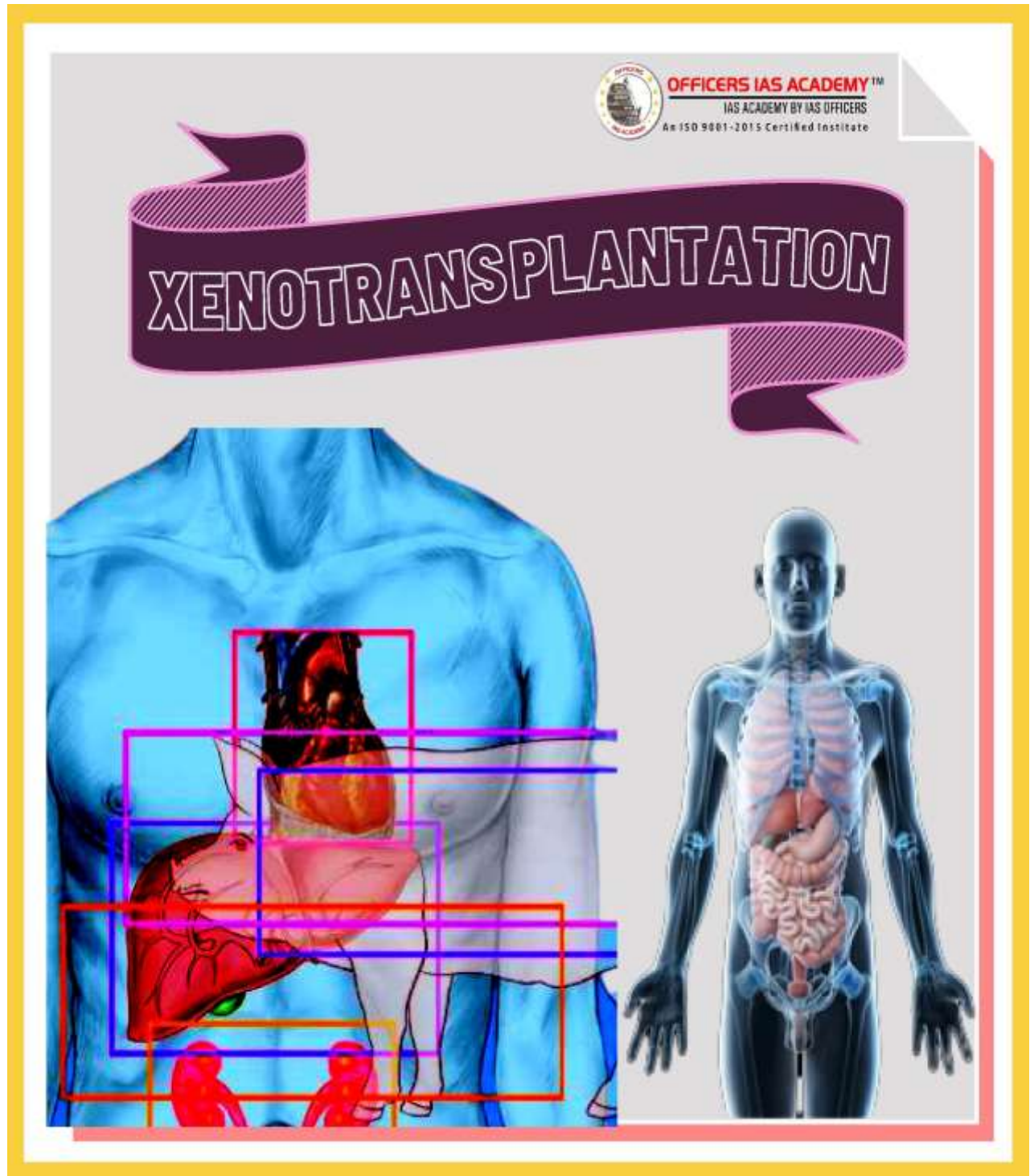
Defence and strategic agreements

- Over the years, the strategic bilateral relationship with its partners, including the dialogues held in the 2+2 format, have produced tangible and far-reaching results for India.
- India and the US have signed a troika of "foundational pacts" for deep military cooperation, beginning with the Logistics Exchange Memorandum of Agreement (**LEMOA**) in 2016, followed by the Communications Compatibility and Security Agreement (**COMCASA**) after the first 2+2 dialogue in 2018, and then the Basic Exchange and Cooperation Agreement (**BECA**) in 2020.

For doubts and queries email us at doubts@officerspulse.com

INFOGRAPHIC OF THE WEEK

1) XENOTRANSPLANTATION



For more such graphic learnings, visit <https://officerspulse.com/infographics/>

For free learning, visit www.officerspulse.com

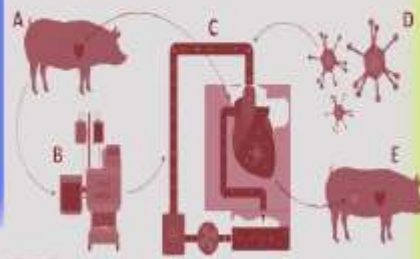
WHY IN NEWS:



The first person to receive a heart transplant from a pig has died, two months after the groundbreaking experiment.



Prior attempts at such transplants – or xenotransplantation – have failed largely because patients' bodies rapidly rejected the animal organ. This time, surgeons used a heart from a gene-edited pig.



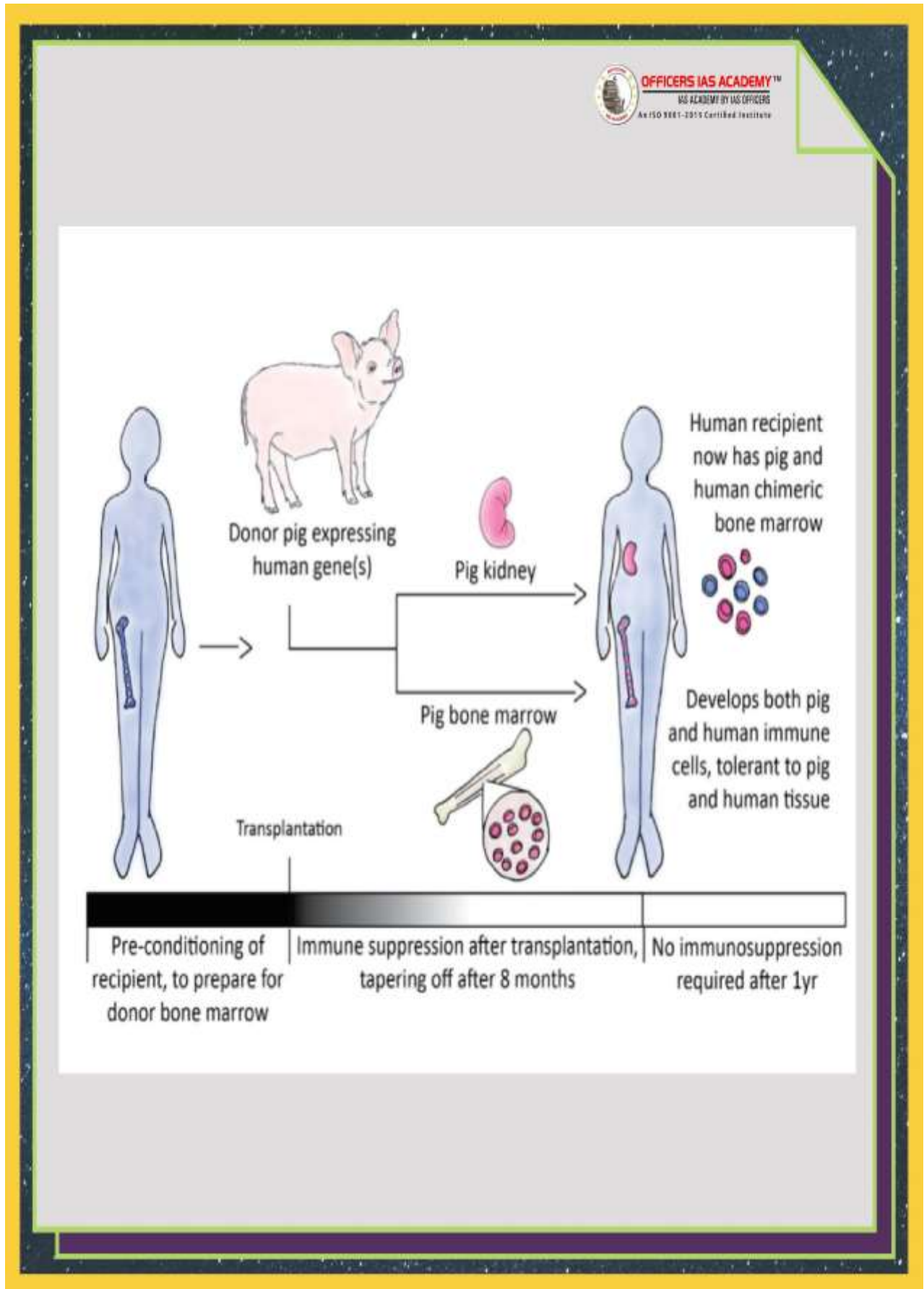
2 MONTHS

Scientists had modified the animal to remove pig genes that trigger the hyper-fast rejection and add human genes to help the body accept the organ.



WHAT IS XENOTRANSPLANTATION





For more such graphic learnings, visit <https://officerspulse.com/infographics/>

For free learning, visit www.officerspulse.com



OFFICERS IAS ACADEMY™
IAS ACADEMY BY IAS OFFICERS
An ISO 9001:2015 Certified Institute

SIGNIFICANCE



This breakthrough may bring us one step closer to resolving the worldwide organ scarcity.

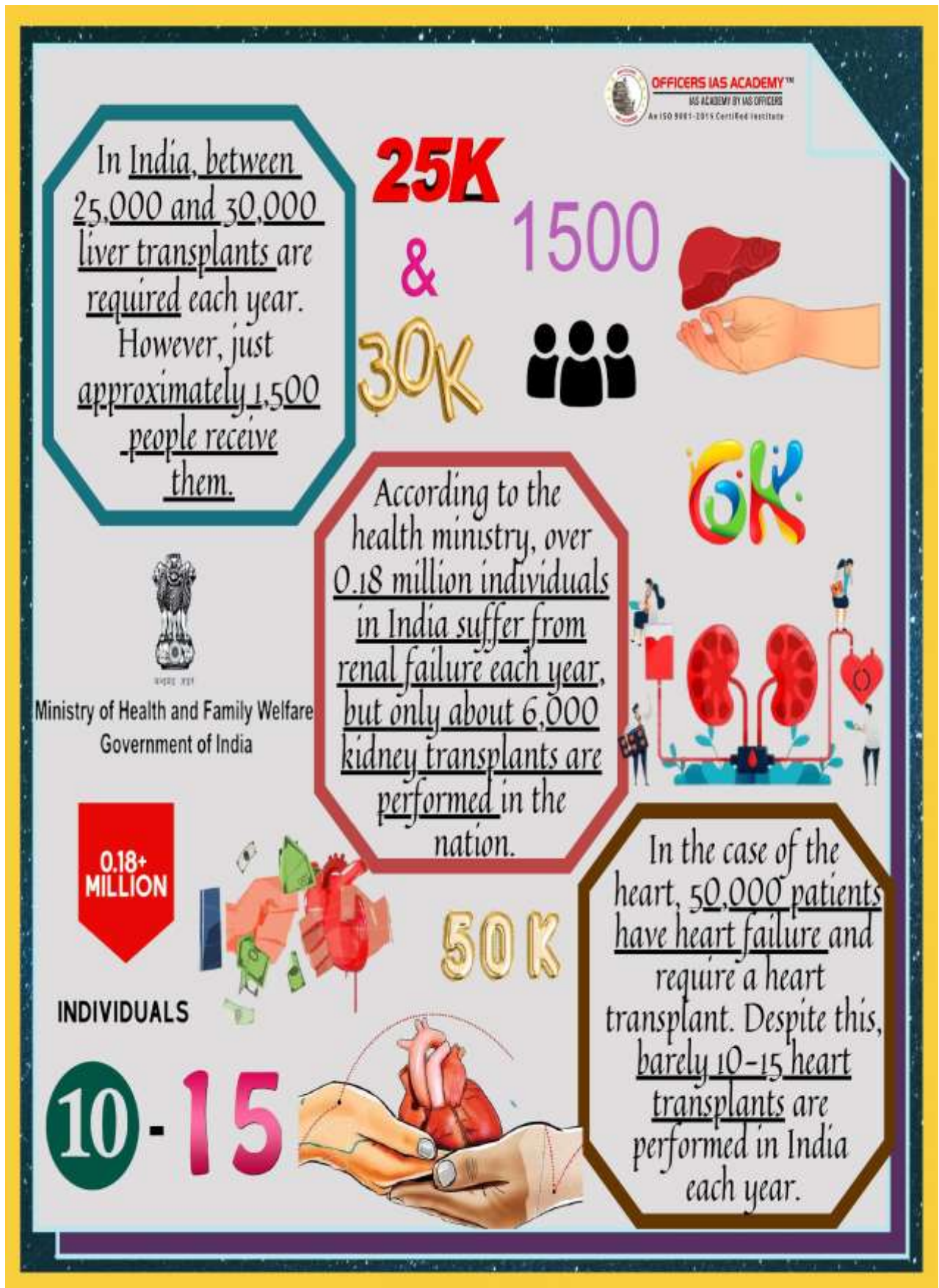
Xenotransplantation, if found compatible in the long run, could help provide an alternative supply of organs to those with life-threatening diseases.



It can eliminate illegal organ trafficking.

For more such graphic learnings, visit <https://officerspulse.com/infographics/>

For free learning, visit www.officerspulse.com



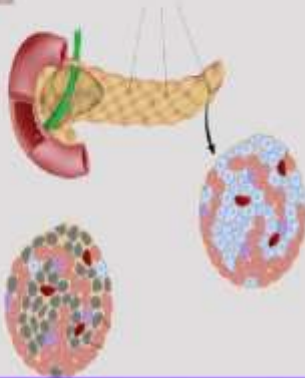
For more such graphic learnings, visit <https://officerspulse.com/infographics/>

For free learning, visit www.officerspulse.com

Pigs have an edge over primates
 when it comes to organ
 harvesting since they are easy to
grow and reach a mature human
size in six months.

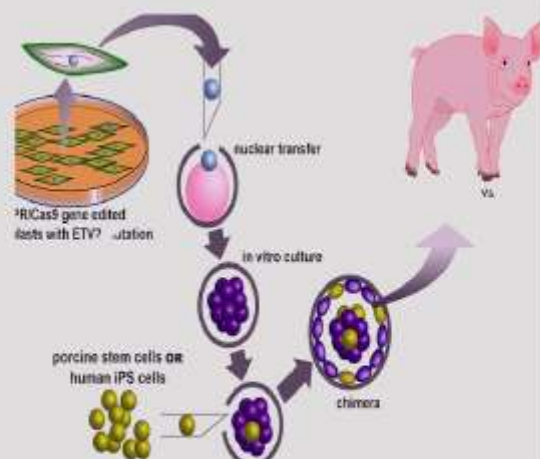


Six
 MONTHS



Pig heart valves are frequently
transplanted into humans,
 and some diabetic patients have
 received pancreatic cells from pigs.

Pigs have long been used in
 human medicine, including pig
skin grafts and implantation
of pig heart valves.



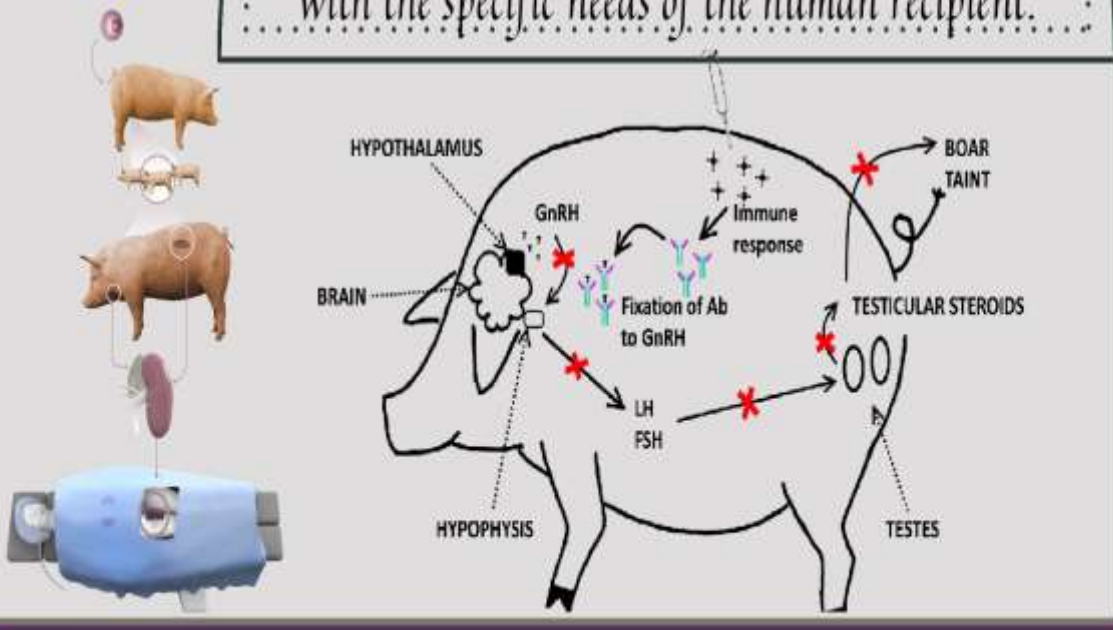
WHY PIGS?



Also, the pig's heart is similar to the human heart.



The pig's anatomical and physiological parameters are similar to that of humans, and the breeding of pigs on farms is widespread and cost-effective. Also, many varieties of pig breeds are farmed, which provides an opportunity for the size of the harvested organs to be matched with the specific needs of the human recipient.



For more such graphic learnings, visit <https://officerspulse.com/infographics/>

For free learning, visit www.officerspulse.com

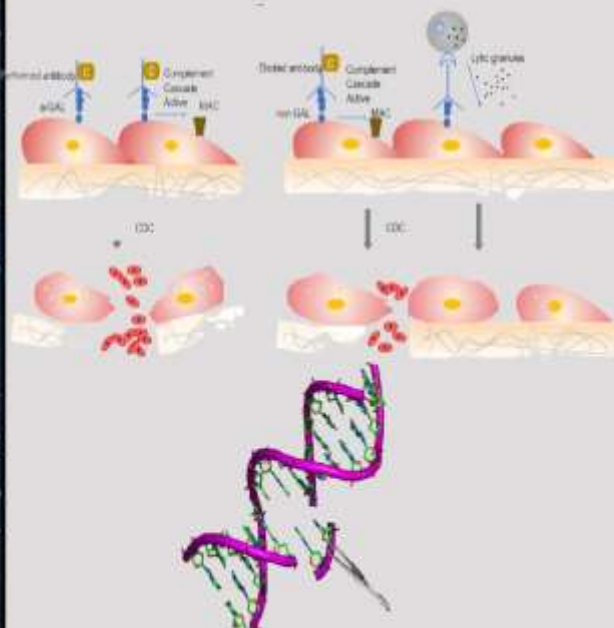
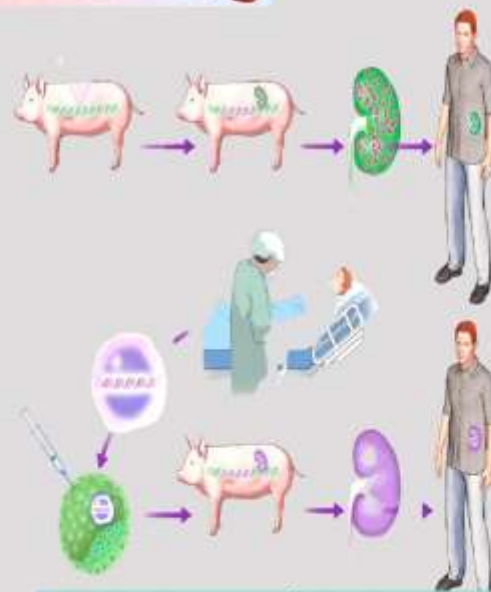


OFFICERS IAS ACADEMY™
IAS ACADEMY BY IAS OFFICERS
An ISO 9001:2015 Certified Institute

HOW IS A PIG HEART MADE COMPATIBLE WITH A HUMAN?



The molecular incompatibility between pigs and humans can trigger several immune complications after the transplant, which might lead to rejection of the xenograft.



To preempt that situation, genetic engineering is used to tweak the genome of the pig to 'disguise' it, so that the immune system of the human recipient fails to recognize it, and the reactions that lead to xenograft rejection not triggered.

Issues associated with xenotransplantation



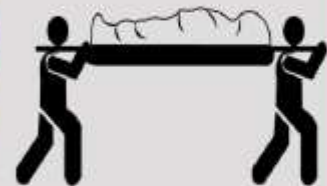
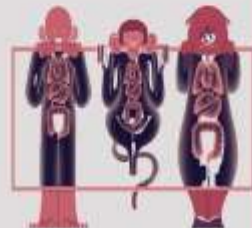
OFFICERS IAS ACADEMY™
IAS ACADEMY BY IAS OFFICERS
An ISO 9001:2015 Certified Institute



Animal rights: Many people, especially animal rights organizations are highly opposed to murdering animals to harvest their organs for human use.

Reduced life expectancy: In the 1960s, many organs were harvested from chimps and transplanted into terminally ill individuals, who did not live much longer as a result.

1960

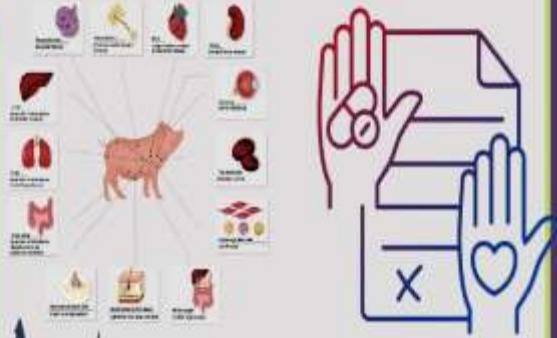




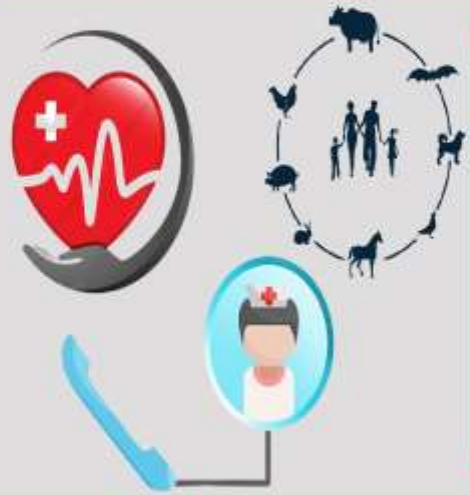
Religious violations: In Islam and many other religions, some animals, such as pork, are banned.



Informed consent: When considering the future uses of xenotransplantation, autonomy and informed consent are critical.



Autonomy



Zoonosis dangers: The safety of public health is an important element to consider. We are already dealing with the most serious zoonotic disease danger.

OFFICERS IAS ACADEMY™
IAS ACADEMY BY IAS OFFICERS
An ISO 9001:2015 Certified Institute

RELATED LAWS

In India, we have the Human Organs Transplant Act 1994, but it doesn't mention animal transplants even as a possibility in extreme emergencies.

ACT
1994

HUMAN ORGAN

Zoonotic pathogens

Transmission

Reservoir/ asymptomatic hosts (Wild animals)

Amplification

Zoonotic overflow and dissemination

Re-emerging diseases

Geographical spread

Emerging diseases

New strains or species

Symptomatic host (Human)

Gene recombination, mutation, Morphology alteration

For more such graphic learnings, visit <https://officerspulse.com/infographics/>

For free learning, visit www.officerspulse.com

OFFICERS IAS ACADEMY™
IAS ACADEMY BY IAS OFFICERS
An ISO 9001:2015 Certified Institute

Way Forward




Instead of outright prohibiting xenotransplantation, the government should examine the possibilities and conduct research and trials before legalising xenotransplantation in India.

India should adopt the Spanish concept of "presumed consent," in which everyone has been deemed a donor after death unless they are opt-out during their lifetime.

OPT-OUT 

Lifetime

For more such graphic learnings, visit <https://officerspulse.com/infographics/>

For free learning, visit www.officerspulse.com

References:

<https://indianexpress.com/article/explained/everyday-explainers/what-is-xenotransplantation-7814612/>

<https://www.thehindu.com/sci-tech/science/us-man-who-got-first-pig-heart-transplant-dies-two-months-after-surgery/article65208441.ece>

For more such graphic learnings, visit <https://officerspulse.com/infographics/>

For free learning, visit www.officerspulse.com

References:

POLITY

- <https://www.thehindu.com/news/national/cabinet-approves-5911-crore-for-rashtriya-gram-swaraj-abhiyan/article65317525.ece>
- <https://pib.gov.in/PressReleasePage.aspx?PRID=1816670>
- <https://pib.gov.in/PressReleasePage.aspx?PRID=1817275>

ENVIRONMENT

- <https://www.thehindu.com/sci-tech/energy-and-environment/explained-whos-air-quality-database-and-its-latest-update/article65308504.ecehttps://www.hindustantimes.com/environment/india-may-miss-its-300-gw-solar-energy-target-for-2030report-101649822523038.html>

ECONOMY

- <https://www.thehindu.com/business/Industry/govt-completed-transactions-worth-96000-crore-in-2021-22-under-nmp/article65315561.ece>
- <https://www.thehindu.com/sci-tech/technology/explained-how-will-cardless-cash-withdrawal-system-at-atms-work/article65314124.ece>
- <https://www.thehindu.com/business/Economy/india-projected-to-grow-at-8-this-fiscal-world-bank/article65317702.ece>
- <https://www.thehindu.com/business/Economy/explained-why-is-india-looking-to-boost-wheat-exports/article65326806.ece>

INTERNATIONAL RELATIONS

- <https://newsonair.gov.in/News?title=India%2c-ADB-sign-2-million-Project-Readiness-Financing-Loan-to-support-municipal-resource-mobilization-in-Nagaland&id=439039>
- <https://newsonair.gov.in/News?title=Ukraine-asks-G7-nations-for-50-billion-US-dollar-in-financial-support&id=439345>

SCIENCE AND TECHNOLOGY

- <https://science.thewire.in/the-sciences/w-boson-mass-anomaly-tevatron-new-physics-standard-model/>

DEFENCE

- <http://www.indiandefensenews.in/2022/04/navy-to-acquire-modified-variants-of.html>
- <https://www.thehindu.com/news/national/navy-to-acquire-modified-variants-of-indigenous-helicopters-for-its-ships/article65320960.ece>
- <https://www.thehindu.com/news/national/navy-accelerates-indigenisation-efforts-focus-on-weapons-and-aviation-items/article65324255.ece>
- <https://www.financialexpress.com/opinion/teaming-up-to-tackle-smuggling-time-for-a-global-response/2489705/>

ART AND CULTURE

- <https://www.thehindu.com/news/cities/bangalore/bengaluru-joins-global-network-of-silk-cities/article65308707.ece>
- <https://vikaspedia.in/agriculture/farm-based-enterprises/sericulture/sericulture-in-india>
- <https://www.thehindu.com/news/national/use-art-to-honour-unsung-heroes-of-india-venkaiah-naidu/article65307279.ece>
- <https://pib.gov.in/PressReleasePage.aspx?PRID=1814830&msclkid=413d586ab96311ec90c4e19a80ade475>
- <https://sangeetnatak.gov.in/award-honours/ratna-awards>
- <https://lalitkala.gov.in/fellowship.html>
- <https://lalitkala.gov.in/showdetails.php?id=43>

PIB

- <https://pib.gov.in/PressReleasePage.aspx?PRID=1816459>

- <https://pib.gov.in/PressReleasePage.aspx?PRID=1816795>
- <https://pib.gov.in/PressReleasePage.aspx?PRID=1817110>

AIR

- <https://newsonair.gov.in/News?title=Over-3-lakh-e-Sanjeevani-Teleconsultations-provided-to-people-in-a-single-day%2c-says-Health-Minister&id=439347>
- <https://newsonair.gov.in/News?title=Pan-India-electronic-trading-portal%2c-e-NAM%2c-completes-6-years&id=439169>
- <https://newsonair.gov.in/News?title=IIP-rises-1.7-%25-in-February-compared-to-1.5-%25-in-January->

[2022%3a-Government-data&id=439059](https://pib.gov.in/PressReleasePage.aspx?PRID=1816795)

EDITORIALS

- <https://www.thehindu.com/opinion/oped/getting-serious-about-supporting-the-care-economy/article65309362.ece>
- <https://www.thehindu.com/opinion/lead/hops-as-a-route-to-universal-health-care/article65315386.ece>

INDIAN EXPRESS

- <https://indianexpress.com/article/explained/everyday-explainers/india-2-2-dialogue-talks-explained-7865401/>